APPEAL BRIEF UNDER 37 C.F.R. § 41.37

TABLE OF CONTENTS

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Appellant(s):	Kuriacose Joseph et al.	Examiner: Yogesh Garg	
Serial No.:	09/903,457	Group Art Unit: 3625	
Filed:	July 10, 2001	Docket No.: 2050.001US6	
Customer No.: 44367		Confirmation No.: 9752	
Title:	APPARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS FOR A MULTIMEDIA SYSTEM, AND METHOD AND SYSTEM TO ORDER AN ITEM USING A DISTRIBUTED COMPUTING SYSTEM		

APPEAL BRIEF UNDER 37 CFR § 41.37

Mail Stop Appeal Brief- Patents
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

The Appeal Brief is presented in support of the Notice of Appeal to the Board of Patent Appeals and Interferences, filed on June 7, 2010, from the Final Rejection of claims 165-167, 185, 218-220, 236, 252 and 256-261 of the above-identified application, as set forth in the Office Action mailed on January 7, 2010.

The Commissioner of Patents and Trademarks is hereby authorized to charge Deposit Account No. 19-0743 in the amount of $540.00 which represents the requisite fee set forth in 37 C.F.R. § 41.20(b)(2). The Appellants respectfully request consideration and reversal of the Examiner's rejections of the pending claims.

1. REAL PARTY IN INTEREST

The real party in interest of the above-captioned patent application is the assignee, OpenTV, Inc.

2. RELATED APPEALS AND INTERFERENCES

A Notice of Appeal was filed on May 18, 2010, in related U.S. Application Serial No. 09/672,523, entitled "METHOD AND SYSTEM TO FACILITATE ORDERING OF AN ITEM" and filed on September 27, 2000.

3. STATUS OF THE CLAIMS

The present Reissue application was filed on July 10, 2001 with claims 1-245. In a Preliminary Amendment filed on July 10, 2001 claims 1-143 were cancelled and claims 246-255 were added. In a Response to Restriction Requirement filed on August 6, 2007, claims 144-164, 186-217, 237-246, 248-249, 251 and 253-255 were cancelled. In a first Office Action mailed September 17, 2007, claims 168-184, 221-235, 247 and 250 were withdrawn from consideration. In a Response to the first Office Action filed on February 29, 2008, claims 256-261 were added. Claims 165-167, 185, 218-220, 236, 252 and 256-261 stand twice rejected, remain pending, and are the subject of the present Appeal.

4. STATUS OF AMENDMENTS

A Substitute Combined Reissue Declaration and Power of Attorney was filed on June 7, 2010.

5. SUMMARY OF CLAIMED SUBJECT MATTER

INDEPENDENT CLAIM 165

[Specification: page 8 line 35 – page 9 line 2.]

165. A method to facilitate placing an order for an item, the method comprising:

receiving an order request at a client system; *[Specification: page 8 lines 35-36.]*

automatically determining an item identity for an item to which the order request pertains; *[Specification: page 8 lines 60-63.]*

automatically retrieving personal information previously stored in a permanent memory in the client system, the retrieved personal information pertaining to a user associated with the client system; and *[Specification: page 8 lines 56-58.]*

causing an order to be placed, the order including the item identity and the retrieved personal information. *[Specification: page 8 line 64 – page 9 line 2.]*

INDEPENDENT CLAIM 218

[Specification: page 8 line 35 – page 9 line 2; Fig. 4: data stream receiver 207 and processing unit 224.]

218. A client system including:

a receiver *[Fig. 4, 207]* to receive data including information related to an item; and

a processing unit *[Fig. 4, 224]* to:

receive an order request; *[Specification: page 8 lines 35-36.]*

automatically determine an item identity for the item utilizing the information related to the item; *[Specification: page 8 lines 60-63.]*

automatically retrieve personal information previously stored in a permanent memory in the client system, the retrieved personal information pertaining to a user associated with the client system; and *[Specification: page 8 lines 56-58.]*

cause an order to be placed, the order including the item identity and the retrieved personal information. *[Specification: page 8 line 64 – page 9 line 2.]*

INDEPENDENT CLAIM 252

[Specification: page 8 line 35 – page 9 line 2; Fig. 4: RAM 212.]

252. A machine-readable medium embodying a sequence of instructions that, when executed by a machine, cause the machine to facilitate placing an order for an item by:

receiving an order request at a client system; *[Specification: page 8 lines 35-36.]*

automatically determining an item identity for an item to which the order request pertains; *[Specification: page 8 lines 60-63.]*

automatically retrieving personal information previously stored in a permanent memory in the client system, the retrieved personal information pertaining to a user associated with the client system; and *[Specification: page 8 lines 56-58.]*

causing an order to be placed, the order including the item identity and the retrieved personal information. *[Specification: page 8 line 64 – page 9 line 2.]*

INDEPENDENT CLAIM 260

[Specification: page 8 line 35 – page 9 line 2; Fig. 4: data stream receiver 207 and processing unit 224.]

260. An interactive television system, the system including:

a receiver *[Fig. 4, 207]* to receive data including information related to an item; and

a processing unit *[Fig. 4, 207]* to:

receive an order request; *[Specification: page 8 lines 35-36]*

automatically determine an item identity for the item utilizing the information related to the item; *[Specification: page 8 lines 60-63.]*

automatically retrieve personal information previously stored in a permanent memory in the client system, the retrieved personal information pertaining to a user associated with the client system; and *[Specification: page 8 lines 56-58.]*

cause an order to be placed, the order including the item identity and the retrieved personal information. *[Specification: page 8 line 64 – page 9 line 2.]*

This summary does not provide an exhaustive or exclusive view of the present subject matter, and Appellants refer to each of the appended claims and its legal equivalents for a complete statement of the invention.

6. GROUNDS OF REJECTION TO BE REVIEWED ON APPEAL

Claims 165-167, 185, 218-220, 236, 252, and 256-261 were rejected as being based upon a defective reissue Declaration.

Claims 165-167, 185, 218-220, 236,252, and 256-261 were rejected under 35 U.S.C. 251 as "being an improper recapture of broadened claimed subject matter surrendered in the application for the patent upon which the present reissue is based."[1]

Claims 165-167, 185, 218-220, 236 and 252 165-167, 185,218-220, 236, 252, and 256-261 were rejected under 35 U.S.C. 103(a) as being unpatentable over Pat. No. 5,621,456, Florin et al (hereinafter Florin) in view of Garneau et al. (US Patent 5,497,420), hereinafter, Garneau.

[1] Office Action mailed on January 7, 2010, page 7.

7. ARGUMENT

The three identified issues presented for determination in this appeal will be addressed in separate identified sections below.

A) The Rejection of Claims 165-167, 185, 218-220, 236, 252, and 256-261 under 35 U.S.C. §251 as Being Based upon a Defective Reissue Declaration

The Examiner rejected claims 165-167, 185, 218-220, 236, 252, and 256-261 as being based upon a defective reissue declaration under 35 U.S.C. § 251, on the basis that the substitute reissue declaration filed on May 12, 2009 failed to identify the existence of an error, which error causes the original patent to be defective.[2] In the rejection, as set forth in paragraph 3.1 of the Office Action from which this appeal is taken, the asserted deficiency was that the declaration did not "identify a single word, phrase, or expression in the specification or in an original claim(s) 1-9, and how it renders the original patent hole or partly in operative or invalid."[3]

A further Substitute Combined Reissue Declaration and Power of Attorney was filed on June 7, 2010 specifically to address the asserted deficiency of the substitute reissue declaration submitted on May 12, 2009, to which the last Office Action referred. The Substitute Combined Reissue Declaration and Power of Attorney filed on June 7, 2010 is included in the Evidence Appendix.]

1) Applicable Law

Pursuant to MPEP §1414 II (B), Applicants need only specify in the reissue oath/declaration one of the errors upon which reissue is based, and where applicant specifies one such error, this requirement of a reissue oath/declaration is satisfied.

MPEP §1414 II (B) provides as follows.

> (B) Applicant need only specify in the reissue oath/declaration one of the errors upon which reissue is based. Where applicant

[2] Office Action of January 7, 2010, page 6.
[3] Id at page 7.

> specifies one such error, this requirement of a reissue oath/declaration is satisfied. Applicant may specify more than one error. Where more than one error is specified in the oath/declaration and some of the designated "errors" are found to not be "errors" under 35 U.S.C. 251, any remaining error which is an error under 35 U.S.C. 251 will still support the reissue. The "at least one error" which is relied upon to support the reissue application must be set forth in the oath/declaration. It is not necessary, however, to point out how (or when) the error arose or occurred. Further, it is not necessary to point out how (or when) the error was discovered. If an applicant chooses to point out these matters, the statements directed to these matters will not be reviewed by the examiner, and the applicant should be so informed in the next Office action. All that is needed for the oath/declaration statement as to error is the identification of "at least one error" relied upon. In identifying the error, it is sufficient that the reissue oath/declaration identify a single word, phrase, or expression in the specification or in an original claim, and how it renders the original patent wholly or partly inoperative or invalid. The corresponding corrective action which has been taken to correct the original patent need not be identified in the oath/declaration. If the initial reissue oath/declaration "states at least one error" in the original patent, and, *in addition*, recites the specific corrective action taken in the reissue application, the oath/declaration would be considered acceptable, even though the corrective action statement is not required.

Applicant notes that the statement in the MPEP is permissive, stating that the identification of a single word phrase or expression, and how it renders the original patent wholly or partly inoperative or invalid "is sufficient." The MPEP does not state, however, that such showing is the only permissible way to identify the requisite error supporting reissue. However, as set forth below, applicants have submitted a further Substitute Reissue Declaration to meet the letter of in MPEP § 1414 II (B). According to that section, if the initial reissue oath/declaration "states at least one error" in the original patent, the oath/declaration would be considered acceptable, even though the corrective action statement is not required.[4]

2) Discussion

[4] MPEP §1414 II (B).

The substitute reissue declaration filed June 7, 2010 is believed to have cured any basis for this rejection. Specifically, this substitute reissue declaration states as follows:

> I believe original U.S. patent no. 5,819,034 to be wholly or partly inoperative by reason of my claiming less than I had the right to claim in the patent. The claims of the '034 patent relate to a distributed computer system. For example, claim 1 recites a distributed computer system reciting, inter alia, a "further processor including means to . . . form an interactive video program in which execution of said distributed computing application alters said video program." However, the '034 patent also discloses a method and system that, stated generally, uses a client system to facilitate the determining of an item identity for an item to which an order request pertains, automatically retrieving personal information previously stored in a permanent memory in the client system, and causing an order to be placed, where the order including the item identity and the retrieved personal information. This invention is distinct from the invention claimed in the original patent; and is not in any way claimed in the issued claims of the '034 patent. The above quoted language of issued claim 1 is not necessary for patentability of claims drawn to the identified disclosed but unclaimed invention, and thus the presence of this limitation renders the '034 patent partly inoperative. This error is addressed in this reissue by eliminating limitations found in the issued claims, including the limitation from issued claim 1 of the '034 patent quoted above, and by including claims directed to methods of, and systems for, facilitating ordering an item, where the order includes the item identity and the retrieved previously stored personal information. In particular, the error is addressed by the presentation of claims 165-167, 185, 218-220, 236, 252, and 256-261, drawn to this previously unclaimed invention.

Thus, the substitute reissue declaration clearly identifies the error in the original claims, the error being that such claims do not address the different invention covered by the newly-submitted claims. Applicants respectfully request that the rejection be reversed.

B) The Rejection of Claims 165-167, 185, 218-220, 236,252, and 256-261 under 35 U.S.C. 251 as "being an improper recapture of broadened claimed subject matter surrendered in the application for the patent upon which the present reissue is based."

1) Brief Description of the Relevant Prosecution History[5]

[5] In the interest of brevity and conciseness, this section primarily focuses on arguments surrounding originally filed claims 1-4 to show the nature of the subject matter that was at issue and the arguments that were made during prosecution of the original '034 patent. Complete copies of the '034 prosecution history documents discussed in this section are included Appendix attached hereto.

In prosecution of the application that matured to U.S. Patent 5,819,034, claims 1-20 were rejected in the June 17, 1996 Office Action under 35 USC §103 as being unpatentable over Acampora et al. (U.S. Patent No. 5,168, 356) and Harley et al. (U.S. Patent No. 4,965,825). (Office Action mailed June 17, 1996 at pages 3-7. In a Response to the June 17, 1996 Office Action, appellants amended claims 1-3 as follows:

1. (AMENDED) A distributed computer system comprising:

a source of a [continuous] data stream [repetitively] including data representing a distributed computing application, which distributed computing application is repetitively transmitted independent of receiving client computer apparatus; and

a client computer, receiving the data stream, extracting the distributed computing application representative data from the data stream, and executing the extracted distributed computing application.

2. (AMENDED) The computer system of claim 1, further comprising an auxiliary data processor; wherein:

the data stream source produces the data stream further including auxiliary data; and

the client computer, responsive to said distributed computing application, extracts the auxiliary data from the data stream and supplies it to the auxiliary data processor.

3. (AMENDED) The computer system claim 2, wherein[:]the data stream source produces the data stream in the form of a series of time division multiplexed packets, ones of which contain said auxiliary data and represent a television program and others of which re represent a distributed computing application associated with said television program, and wherein said distributed computing application is repeatedly transmitted during the time that said television program is transmitted; and wherein

[a first one of the series of packets contains data representing the distributed computing application and includes identification information indicating that the first one of the series of packets contains data representing the distributed computing application; and

a second one of the series of packets contains auxiliary data and includes identification information indicating that the second one of the series of packets contains auxiliary data.]

said client computer includes a packet selector for selecting and directing packets containing said auxiliary data representing a television program to a

> television signal processor and selecting and directing packets containing said associated distributed computing application to a further processor and;
>
> said further processor including means to assemble said distributed computing application and execute said distributed computing application to form an interactive television program. (Evidence Appendix, Amendment A, pages 2-3. The underlined portions above reflect the additions made by Amendment A and the deletions are shown within brackets [].)

In a FINAL Office Action mailed December 23, 1996, the examiner objected to claims 3-4, 7-9, 16 and 18 as being dependent upon a rejected base claims 1 and 10, but indicated that these claims would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. The examiner rejected claims 1-2 and 10-15 and 17 under 35 USC §103 as being unpatentable over Jongen et al., EPO publication number (145,063). (Final Office Action mailed December 23, 1996, pages 1-4.)

In a Response to the December 23, 1996 FINAL Office Action, appellant amended claims 3 as follows:

> 3. (TWICE AMENDED) [The computer system of claim 2, wherein the data stream source produces the data stream in the form of a]
>
> A distributed computer system comprising:
>
> a source of a data stream providing a series of time division multiplexed packets, ones of which contain [said] auxiliary data [and] that represent a television program, and others of which represent a distributed computing application associated with said television program, and wherein said distributed computing application is repeatedly transmitted during the time that said television program is transmitted [and wherein]
>
> a client computer, which includes a packet selector for selecting and directing packets containing said auxiliary data representing a television program to a television signal processor and selecting and directing packets containing said associated distributed computing application to a further processor; and
>
> said further processor including means to assemble said distributed computing application and execute said distributed computing application to form an interactive television program. (Evidence Appendix, Amendment B, pages 1-2.)

Appellant argued in the Response to the FINAL Office Action mailed December 23, 1996 that as to rejected claims 1 and 10, a "distributed computing application" as the term is used in the claims, is a computer program that is executable, and that in contrast, Jongen et al. teach teletext data which may not be considered to be an executable application. Appellant

further argued that Jongen et al. do not teach transmitting a program to display teletext data along with the teletext data, and therefore does not show or suggest a client computer for extracting the distributed computing application or for executing the extracted distributed computing application. Appellant argued as to claim 2 that "auxiliary data" of claim 2 is a signal other than the distributed computer application, and that Jongen et al. teach no apparatus responsive to a transmitted distributed computer application to extract and apply an auxiliary signal to an auxiliary apparatus. (Evidence Appendix, Amendment B, pages 5-6.)

In an Advisory Action mailed February 28, 1997, the examiner refused to enter the amendments proposed in the Response to the FINAL Office Action but indicated that although claims 3-4, 7-9 and 16-18 were objected they would be allowable if amended to include the limitations of their base claims and all intervening claims. The examiner rejected claims 1-2, 10-15 and 17 were rejected. (Advisory Action mailed February 28, 1997, page 1.)

In a Response to the Advisory Action mailed February 28, 1997, the appellant requested cancellation of claims 1, 2, 9-15, 17. Appellant also requested entry of amendment to claims 3, 4, 7 and 16 to include the limitations of their base claims and all intervening claims to thereby place claims 3-4, 7-8 and 16 in condition for allowance. (Evidence Appendix, Amendment C, pages 1-5.)

In an Office Action mailed April 11, 1997, the examiner indicated that claim 16 was allowable. The examiner rejected claims 3-4 and 7-8 under 35 USC §103 as being unpatentable over Lappington et al. (U.S. Patent No. 5,343,239) in view of Jongen et al. EPO publication no. (145,063). (Office Action mailed April 11, 1997, pages 1-4.)

In a Response to the April 11, 1997 Office Action, appellant amended claims 3 as follows:

> 3. (THRICE AMENDED). A distributed computer system comprising:
> a source of a data stream providing a series of time division multiplexed packets, ones of which contain auxiliary data that represent a [television] video program, and others of which represent a distributed computing application associated with said [television] video program, and wherein said distributed computing application is repetitively transmitted independent of receiving client

> computer apparatus during [the] times that said [television] video program is transmitted;
>
> a client computer, which includes a packet selector connected to said source for selecting and directing packets containing said auxiliary data representing [a television] said video program to a [television] video signal processor and selecting and directing packets containing said associated distributed computing application to a further processor; and
>
> said further processor including means to assemble said distributed computing application and execute said distributed computing application to form an interactive [television] video program in which execution of said distributed computing application alters said video program. (Evidence Appendix, Amendment D, pages 1-2.)

As to amended claim 3, appellant argued that Lappington describes a system wherein an interactive program is inserted in the vertical blanking intervals (VBI) of a TV program. Appellant argued that Lappington does not disclose execution of a distributed computing application that alters a video program, and that Lappington does not disclose a data stream containing TDM packets some of which contain auxiliary data that represent a video program and others of which represent a distributed computing application. Moreover, appellant argued that Lappington does not teach a packet selector to direct auxiliary packets to a video signal processor and to select other packets relating to the distributed computing application to a further processor. (Evidence Appendix, Amendment D, pages 4-8.)

In a Notice of Allowance mailed May 11, 1998, the examiner allowed claims 3, 4, 7, 8, 16 and 21-24, which became new claims 1-9 of U.S. Patent No, 5, 819,034. (Notice of Allowance mailed May 11, 1998.)

2) Applicable Law

Reissue of defective patents is governed by 35 U.S.C. § 251 which states, in part:

> Whenever any patent is, through error without any deceptive intention, deemed wholly or partly inoperative or invalid, by reason of ... the patentee claiming more or less than he had a right to claim in the patent, the Director shall, on the surrender of such patent and the payment of the fee required by law, reissue the patent for the invention disclosed in the original patent

The reissue statute expressly permits a patentee to correct an error in a patent, and obtain reissue claims that the patentee had a right to claim for the invention disclosed in the original

patent if the reissue is filed, as appellants have done, within two years from the date the original patent issues. In *Hester Industries, inc. v Stein, Inc.*, (Fed. Cir. 1998), 142 F.3d 1472, the Court reversed a District Court holding that the "original patent" clause of § 251 requires an "objective" intent, manifested in the original patent, to claim the invention as claimed in the reissue claims. The Court in *Hester Industries* held that instead, the essential requirement under the "original patent" clause of § 251, "is whether one skilled in the art, reading the specification, would identify the subject matter of the new claims as invented and disclosed by patentees." 142 F.3d 1472. Thus, there is no requirement that the same invention be claimed in both a reissue patent and its original patent.

Under the prohibition against recapture, Appellants cannot regain subject matter that was surrendered to obtain allowance of the original claims.[6] The prohibition against recapture is evaluated in reference to a three-step process to determine:

(1) whether, and in what respect, the reissue claims are broader in scope than the original patent claims;

(2) whether the reissue claims relate to the subject matter surrendered in the original prosecution; and

(3) whether the reissue claims were materially narrowed in other respects, so that the claims may not have been enlarged, and hence avoid the recapture rule.[7]

A limitation "materially narrows" the reissue claims if the narrowing limitation is directed to one or more "overlooked aspects" of the invention.[8]

The MPEP expressly provides in § 1412.02(I)(C) that if the reissue claims are claiming additional inventions or embodiments not originally claimed, then recapture will not be present:

> If surrendered subject matter has been entirely eliminated from a claim in the reissue application, or has been in any way broadened in a reissue application claim, then a recapture rejection under 35 U.S.C. § 251 is proper and must be made for

[6] *North Am. Container, Inc. v. Plastipak Pkg., Inc.*, 415 F.3d 1335, 1349 (Fed. Cir. 2005) (citing In re Clement, 131 F.3d 1464, 1468 (Fed. Cir. 1997)).
[7] *North Am. Container*, 415 F.3d at 1349.
[8] *Hester Indus., Inc. v. Stein, Inc.,* 142 F.3d 1472, 1482-83 (Fed. Cir. 1998).

> that claim. If, however, the reissue claim(s) are really claiming additional inventions/embodiments/species not originally claimed (i.e., overlooked aspects of the disclosed invention), then recapture will not be present.[9] (Emphasis added.)

Thus, the MPEP acknowledges the position stated in *Hester Industries,* recapture will not be found when the reissue claims are directed to "overlooked aspects" of the disclosed invention.

3) The requirements for a 35 U.S.C. § 251 rejection for improper recapture of the reissue claim subject matter have not been met

The bases alleged by the examiner in the Office Action mailed January 7, 2010 in the instant reissue application for rejection for improper recapture under 35 U.S.C. § 251 can be summarized as follows: (a) the reissue claims omit limitations relied upon by the appellant to overcome rejections in the original application, and even though the reissue claims are narrower in other respects completely unrelated to rejections in the original application, recapture bars the claim; and (b) the subject matter of the reissue claims is directed to a distinct and different invention from the invention in the original patent, and therefore, is not an "overlooked aspect" of the original invention that would avoid the recapture rule. (Office Action mailed January 7, 2010 at pages 10-12.)

Specifically, in the Office Action mailed January 7, 2010 in the instant reissue application, the examiner stated,

> A: Analysis per Clement three-step test:
>
> New claims 165-167, 185,218-220,236,252, and 256-261 are broader than the patentee claims 1-9 because they do not include limitations recited in the patented claims 1-9. There was a surrender of subject matter in the original application prosecution and the broadening of the reissue claims is in the area of the surrendered subject matter. The omitted/broadened limitations in the reissue claims are directed to limitations relied upon by the applicant in the original application to make the claims allowable over prior art [excerpts from claims 1, 6, 7, and 9 omitted] The filed re-issue claims are broader than the original patent claims by not including the surrender-generating limitations (as described above) will be barred by the recapture rule even though there is narrowing of the claims

[9] MPEP § 1412.02(I)(C), 8th ed., Rev. 7, July 2008.

> not related to the surrender-generating limitation. As stated in the decision of *In re Clement*, 131 F.3d at 1470, 45 USPQ2d at 1165, if the reissue claim is broader in an aspect germane to a prior art rejection, but narrower in another aspect completely unrelated to the rejection, the recapture rule bars the claim. *Pannu v. Storz Instruments Inc.,* supra, then brings home the point by providing an actual fact situation in which this scenario was held to be recapture.
>
> B: Analysis as per *Hester Industries, Inc, v Stein, Inc.*: In order to satisfy the two conditions, the subject matter that materially narrows the reissue claims should be the overlooked aspect of the original invention claimed in the patent. In the instant case, the reissue claims do not include any subject matter of the patented claims (independent patented claims 1, 6, 9, 10) but instead the subject matter that materially narrows the reissue claims is directed to a distinct and different invention and it is not the overlooked aspect of the original invention. (Emphasis added.) (Office Action mailed January 7, 2010, pages 10-12.)

The examiner sets forth an erroneous characterization of the law of recapture under 35 U.S.C. § 251. As explained in the section above, *Hester Industries* clearly rejects the proposition that the invention that is the subject matter of reissue claims must be the same as the invention in the original patent. Rather, as explained in the section above, according to *Hester Industries*, the essential requirement under the "original patent" clause of § 251, is whether a person of ordinary skill in the art would identify within the specification, the subject matter of the reissue claims as having been invented and disclosed by patentees.

Consistent with *Hester Industries*, the Court in *Medtronic, Inc. v Guidant Corporation,* (Fed. Cir. 2006), 465 F.3d 1360, held that a failure of the prosecuting attorney and the examiner to consider subject matter disclosed in the specification to be a part of the invention can bar application the rule against recapture. The invention in the *Medtronic* involved a method that works through a pacemaker device which either "conditionally" or "unconditionally" paces the two ventricles of the heart to cause simultaneous ventricular contractions. *Medtronic,* 465 F.3d 1360. The original patent contained claims to the "conditional" embodiment but lacked claims to the "unconditional" embodiment. The reissue patent added claims to the "unconditional" embodiment. *Medtronic,* 465 F.3d 1360. The Court in *Medtronic* ruled that the claims to "unconditional" embodiment were not barred by the recapture rule despite the fact that claims in the original patent initially covered the "unconditional" embodiment but were amended during prosecution to not cover the "unconditional" embodiment. The *Medtronic* Court reasoned that neither the examiner nor the

prosecuting attorney considered the "unconditional" embodiment as part of the invention, and that the amendment resulting in removal of the "unconditional" embodiment was intended as a clarifying amendment, and that there was no admission that the "unconditional" embodiment was not patentable. *Medtronic,* 465 F.3d 1360.

In contrast, in the recent decision, *Ex Parte Youman*, BPAI Appeal 2010-007029, the Board of Patent Appeals and Interferences ruled that aspects of an invention involving an electronic television programming guide set forth in reissue claims were not overlooked in during prosecution of the original patent. The Board in *Ex Parte Youman* reasoned that while the specific language "wireless remote," "nonalphanumeric keys," and "changing from a first character to a second character" in reissue claim 24 was not explicitly claimed during original prosecution, "these limitations were, in fact, contemplated by—and indeed correspond to—the language of patent claim 1, particularly in light of its functional language and Appellants' accompanying arguments in conjunction with amending this claim." *Ex Parte Youman*, page 20. Thus, unlike the situation in *Medtronic*, the reissue claims in *Ex Parte Youman* did not fall within an exception to the recapture rule since they did not relate to an aspect of the invention that had been overlooked during prosecution of the original application.

Claims 165-167, 185, 218-220, 236, 252, and 256-261 in the instant application cover "overlooked aspects" of the disclosed invention, which fall within the exception to the rule against recapture explained in *Hester Industries* and as included in the third step of the three part test and included in MPEP § 1412.02(I)(C).

Method claim 165 recites a method to facilitate placing an order for an item that includes the steps of receiving an order request at a client system, automatically determining an item identity for an item to which the order request pertains, automatically retrieving personal information, pertaining to a user associated with the client system, previously stored in a permanent memory in the client system, and causing an order to be placed, the order including the item identity and the retrieved personal information. Client system claim 218, machine-readable medium claim 252 and interactive television system claim 260 contain similar limitations.

In contrast, patent claim 1 of the original U.S. Patent No. 5,819, 034 recites a distributed computer system, where a source of a data stream provides a distributed computing application a client computer that, in turn, provides the distributed computing application to a further processor for execution. The '034 patent issued from a reexamination patent application no. 08/233,908 that was filed with reexamination claims 1-20. Patent claim 1 of the '034 patent is reproduced below.

> 1. A distributed computer system comprising:
>
> a source of a data stream providing a series of time division multiplexed packets, ones of which contain auxiliary data that represent a video program, and others of which represent a distributed computing application associated with said video program, and wherein said distributed computing application is repetitively transmitted independent of receiving client computer apparatus during times that said video program is transmitted;
>
> a client computer, which includes a packet selector connected to said source for selecting and directing packets containing said auxiliary data representing said video program to a video signal processor and selecting and directing packets containing said associated distributed computing application to a further processor; and
>
> said further processor including means to assemble said distributed computing application and execute said distributed computing application to form an interactive video program in which execution of said distributed computing application alters said video program.

Appellant overlooked the method to facilitate placing an order for an item of reissue claim 165 and the subject matter of reissue claims 166-167, 185, 218-220, 236, 252, and 256-261 in the course of prosecuting claims related to a distributed computing system of the original U.S. Patent No. 5,819, 034. Appellants never mentioned the ordering of an item, or receiving an order request, or any operations that may be considered as related to processing of an order request in the course of the prosecution of the '034 patent. While a method to facilitate an order for an item was described in the specification of the '034 patent, the method was not at any time claimed or discussed during the source of prosecution of the reexamination application. The absence of any reference to a method to facilitate an order for an item indicates that the limitations of "receiving an order request at a client system," "automatically determining an item identity for an item to which the order request pertains," "automatically retrieving personal information previously

stored in a permanent memory in the client system, the retrieved personal information pertaining to a user associated with the client system," and "causing an order to be placed, the order including the item identity and the retrieved personal information" are indeed overlooked aspects of the invention that constitute an exception to the rule against recapture.

C) Rejection of claims 165-167, 185, 218-220, 236, 252, and 256-261 under 35 U.S.C. §103(a)

In the Office Action of January 7, 2010, the Examiner reiterated the rejection of claims 165-167, 185, 218-220, 236, 252, and 256-261 under 35 U.S.C. § 103(a) as being obvious over Florin et al. (U.S. Patent No. 5,621,456) in view of Garneau et al. (U.S. Patent No. 5,497,420).

1) Applicable Law

Pursuant to 35 U.S.C. §103(a), "[a] patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains." The determination of obviousness under 35 U.S.C. § 103 is a legal conclusion based on factual evidence.[10]

Examiner has the burden under 35 U.S.C. § 103 to establish a *prima facie* case of obviousness.[11] To establish *prima facie* obviousness of a claimed invention, all the claim limitations must be taught or suggested by the prior art.[12] "Mere identification in the prior art of each element is insufficient to defeat the patentability of the combined subject matter as a whole."[13] Such a teaching or suggestion must be supported by substantial evidence.[14] Substantial evidence is something more than a mere scintilla of evidence.[15] "Rejections on obviousness grounds cannot be sustained by mere conclusory statements; instead, there must be

[10] *See Princeton Biochemicals, Inc. v. Beckman Coulter, Inc.*, 7, 1336-37 (Fed. Cir. 2005).
[11] *In re Fine*, 837 F.2d 1071, 1074 (Fed. Cir. 1988).
[12] M.P.E.P. §2143.03 (citing *In re Royka*, 490 F.2d 981 (CCPA 1974)).
[13] *In re Kahn*, 2006 WL 708687, *9 (Fed. Cir. 2006).
[14] *Id* at *8.
[15] *Id*.

some articulated reasoning with some rational underpinning to support the legal conclusion of obviousness."[16]

2) Discussion

Claim 165 requires "automatically retrieving personal information ... previously stored ... in the client system." The Examiner correctly observed that Florin fails to "explicitly disclose" that limitation,[17] and cites Garneau to teach the limitation (citing col. 2, lines 25-37 of the reference). Garneau is inaccurately characterized as teaching "automatically retrieving a physical address of the subscriber terminal . . .;"[18] although the retrieved information in Garneau is actually "a unique logical or physical terminal address,"[19] not personal information.

In Garneau, when a subscriber inputs a number corresponding to a particular program or code into a subscriber terminal, the terminal retrieves a logical or physical ID of the terminal. This ID, that may be stored in ROM, is used at the central station to determine whether the terminal is associated with a valid subscriber terminal number.[20] Thus, the logical or physical ID of the terminal in Garneau is machine-specific and merely identifies a piece of hardware that may be utilized by any number of users. Thus, it is not personal information of a user.

The Office Action misquotes Garneau by characterizing the logical or physical ID of the terminal as "a physical address of the subscriber terminal" and then extrapolates from that erroneous starting point, stating that Garneau teaches "retrieving a physical address . . .previously stored to enable placement of an order for a pay-per-view event" and that it would be obvious to one skilled in the art" to incorporate this feature of Garneau because it would help the [Florin] process to coordinate the billing and conclusion of the order by identifying the buyer and billing it to him the order charges.[21] Such extrapolation is entirely unwarranted based on the description of Garneau. Garneau therefore fails to disclose or suggest "retrieving *personal information* previously stored ... in the client system" recited in claim 165.

---

[16] *Id* at *10 (quoted in *KSR Int'l Co. v. Teleflex Inc.*, 127 S.Ct. 1727 (2007)).
[17] Office Action of January 7, 2010, page 14.
[18] Office Action of January 7, 2010, page 14.
[19] Garneau, col. 2, lines 25-28.
[20] Garneau, 2: 15-47.
[21] Office Action of January 7, 2010, page 14.

Thus Florin fails to disclose the identified limitation of retrieving previously stored personal information; and the Garneau reference asserted to teach that limitation, does not teach it. Thus the combination of Florin and Garneau does not disclose or suggest the recited limitation of "automatically retrieving personal information ... previously stored ... in the client system," as recited in claim 165, and thus cannot render the claim obvious.[22] Claims 218, 252, 260, and their respective dependent claims are patentable for at least the reasons articulated above. Applicants respectfully request reversal of the rejection of the identified claims.

[22] *KSR v. Teleflex*, 82 U.S.P.Q.2d at 1395 (2007) ("A rationale to support a conclusion that a claim would have been obvious is that ***all the claimed elements were known*** in the prior art . . .").

SUMMARY

The reasons argued above are summarized as follows. First, the substitute reissue declaration filed on June 7, 2010 clearly identifies the error in the original claims and therefore is not defective. Second, because the reissue claims are claiming an additional invention not originally claimed, recapture is not present. Finally, the obviousness rejections that rely on combinations of references that include Florin and Garneau are improper. Reversal of the rejection and allowance of the pending claims are respectfully requested.

If necessary, please charge any additional fees or credit overpayment to Deposit Account No. 19-0743.

Respectfully submitted,

SCHWEGMAN, LUNDBERG & WOESSNER, P.A.
P.O. Box 2938
Minneapolis, MN 55402
(408) 278-4052

Date November 8, 2010 By /Elena Dreszer/

Elena B. Dreszer
Reg. No. 55,128

8. CLAIMS APPENDIX

165. A method to facilitate placing an order for an item, the method comprising:

receiving an order request at a client system;

automatically determining an item identity for an item to which the order request pertains;

automatically retrieving personal information previously stored in a permanent memory in the client system, the retrieved personal information pertaining to a user associated with the client system; and

causing an order to be placed, the order including the item identity and the retrieved personal information.

166. The method of claim 165 wherein the order request is received at the client system through detection of an order action by the user utilizing the client system.

167. The method of claim 166 wherein the order action is performed during the showing and/or describing of the item via the client system.

185. The method of claim 165 including receiving, at the client system from a server system, an order confirmation.

218. A client system including:

a receiver to receive data including information related to an item; and

a processing unit to:

receive an order request;

automatically determine an item identity for the item utilizing the information related to the item;

automatically retrieve personal information previously stored in a permanent memory in the client system, the retrieved personal information pertaining to a user associated with the client system; and

cause an order to be placed, the order including the item identity and the retrieved personal information.

219. The system of claim 218 wherein the processing unit is to receive the order request through detection of an order action by the user.

220. The system of claim 219 wherein processing unit is to detect the order action during the showing and/or describing of the item by the client system utilizing the information related to the item.

236. The system of claim 218 wherein the receiver is to receive an order confirmation.

252. A machine-readable medium embodying a sequence of instructions that, when executed by a machine, cause the machine to facilitate placing an order for an item by:

receiving an order request at a client system;

automatically determining an item identity for an item to which the order request pertains;

automatically retrieving personal information previously stored in a permanent memory in the client system, the retrieved personal information pertaining to a user associated with the client system; and

causing an order to be placed, the order including the item identity and the retrieved personal information.

256. The method of claim 165, wherein the client system is associated with a television receiver.

257. The method of claim 165, wherein the client system is associated with a television set-top box.

258. The machine-readable medium of claim 252, wherein the client system is associated with a television receiver.

259. The machine-readable medium of claim 252, wherein the client system is associated with a television set-top box.

260. An interactive television system, the system including:

a receiver to receive data including information related to an item; and

a processing unit to:

receive an order request;

automatically determine an item identity for the item utilizing the information related to the item;

automatically retrieve personal information previously stored in a permanent memory in the client system, the retrieved personal information pertaining to a user associated with the client system; and

cause an order to be placed, the order including the item identity and the retrieved personal information.

261. The interactive television system of claim 260, wherein the receiver and the processing unit reside in a television set-top box.

9. EVIDENCE APPENDIX

1. Substitute Combined Reissue Declaration and Power of Attorney filed on June 7, 2010;
2. Papers from the prosecution history of U.S. patent no. 5, 819,034):
   a. Office Action mailed June 17, 1996;
   b. Response to the June 17, 1996 Office Action (Amendment A);
   c. FINAL Office Action mailed December 23, 1996;
   d. Response to the December 23, 1996 FINAL Office Action (Amendment B);
   e. Advisory Action mailed February 28, 1997;
   f. Response to the Advisory Action mailed February 28, 1997 (Amendment C);
   g. Office Action mailed April 11, 1997;
   h. Response to the April 11, 1997 Office Action (Amendment D); and
   i. Notice of Allowance mailed May, 11, 1998.

Evidence Appendix 1

Substitute Combined Reissue Declaration and Power of Attorney filed on June 7, 2010

SCHWEGMAN ■ LUNDBERG ■ WOESSNER

United States Patent Application

SUBSTITUTE COMBINED REISSUE DECLARATION AND POWER OF ATTORNEY

As a below named inventor I hereby declare that: my residence, post office address and citizenship are as stated below next to my name; that

I verily believe I am the original, first and joint inventor of the subject matter which is claimed and for which a patent is sought on the invention entitled: **APPARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS FOR A MULTIMEDIA SYSTEM, AND METHOD AND SYSTEM TO ORDER AN ITEM USING A DISTRIBUTED COMPUTING SYSTEM**,

the specification of which was filed on July 10, 2001 as application serial no. 09/903,457.

I believe original patent 5,819,034 ("the '034 patent"), to be wholly or partly inoperative by reason of my claiming less than I had the right to claim in the patent. The claims of the '034 patent relate to a distributed computer system. For example, claim 1 recites a distributed computer system reciting, inter alia, a "further processor including means to . . . form an interactive video program in which execution of said distributed computing application alters said video program." However, the '034 patent also discloses a method and system that, stated generally, uses a client system to facilitate the determining of an item identity for an item to which an order request pertains, automatically retrieving personal information previously stored in a permanent memory in the client system, and causing an order to be placed, where the order including the item identity and the retrieved personal information. This invention is distinct from the invention claimed in the original patent; and is not in any way claimed in the issued claims of the '034 patent. The above quoted language of issued claim 1 is not necessary for patentability of claims drawn to the identified disclosed but unclaimed invention, and thus the presence of this limitation renders the '034 patent partly inoperative. This error is addressed in this reissue by eliminating limitations found in the issued claims, including the limitation from issued claim 1 of the '034 patent quoted above, and by including claims directed to methods of, and systems for, facilitating ordering an item, where the order includes the item identity and the retrieved previously stored personal information. In particular, the error is addressed by the presentation of claims 165-167, 185, 218-220, 236, 252, and 256-261, drawn to this previously unclaimed invention.

I hereby state that I have reviewed and understand the contents of the above-identified specification, including the claims, as amended by any amendment referred to above.

I acknowledge the duty to disclose information which is material to patentability of this application in accordance with 37 C.F.R. § 1.56 (attached hereto). I also acknowledge my duty to disclose all information known to be material to patentability which became available between a filing date of a prior application and the national or PCT international filing date in the event this is a Continuation-In-Part application in accordance with 37 C.F.R. § 1.63(e).

I hereby claim foreign priority benefits under 35 U.S.C. §119(a)-(d) or 365(b) of any foreign application(s) for patent or inventor's certificate, or 365(a) of any PCT international application which designated at least one country other than the United States of America, listed below and have also identified below any foreign application for patent or inventor's certificate having a filing date before that of the application on the basis of which priority is claimed:

No such claim for priority is being made at this time.

I hereby claim the benefit under 35 U.S.C. § 119(e) of any United States provisional application(s) listed below:

No such claim for priority is being made at this time.

I hereby claim the benefit under 35 U.S.C. § 120 or 365(c) of any United States and PCT international application(s) listed below and, insofar as the subject matter of each of the claims of this application is not disclosed in the prior United States or PCT international application in the manner provided by the first paragraph of 35 U.S.C. § 112, I acknowledge the duty to disclose material information as defined in 37 C.F.R. § 1.56(a) which became available between the filing date of the prior application and the national or PCT international filing date of this application:

Application Number	Filing Date	Status
09/672,523	**September 27, 2000**	**Pending**

I hereby appoint the attorneys associated with the customer number listed below to prosecute this application and to transact all business in the Patent and Trademark Office connected herewith:

Customer Number: 44367

I hereby authorize them to act and rely on instructions from and communicate directly with the person/assignee/attorney/firm/organization/who/which first sends/sent this case to them and by whom/which I hereby declare that I have consented after full disclosure to be represented unless/until I instruct Schwegman, Lundberg & Woessner, P.A. to the contrary.

Please direct all correspondence in this case to **Schwegman, Lundberg, & Woessner, P.A.** at the address indicated below:

Customer Number: 44367

I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

Full Name of joint inventor number 1: **Kuriacose Joseph**
Citizenship: **United States of America** Residence: **Gaithersburg, MD**
Post Office Address: 16124 Orchard Grove Road
Gaithersburg, MD 20878

Signature: Kuriacose Joseph Date: 04/30/2010
Kuriacose Joseph

Full Name of joint inventor number 2: **Ansley Wayne Jessup**
Citizenship: **United States of America** Residence: **Willingboro, NJ**
Post Office Address: 22 Elmwood Lane
Willingboro, NJ 08046

Signature: _____ Date: _____
Ansley Wayne Jessup

Full Name of joint inventor number 3: **Vincent Dureau**
Citizenship: **France** Residence: **Palo Alto, CA**
Post Office Address: 3519 S. Court
Palo Alto, CA 94306

Signature: _____ Date: _____
Vincent Dureau

X Additional inventors are being named on separately numbered sheets, attached hereto.

Full Name of joint inventor number 4: **Alain Delpuch**
Citizenship: **France** Residence: **Paris, France**
Post Office Address: 36 rue Le Brun
Paris, 75013
France

Signature: _____ Date: _____
Alain Delpuch

§ 1.56 Duty to disclose information material to patentability.

(a) A patent by its very nature is affected with a public interest. The public interest is best served, and the most effective patent examination occurs when, at the time an application is being examined, the Office is aware of and evaluates the teachings of all information material to patentability. Each individual associated with the filing and prosecution of a patent application has a duty of candor and good faith in dealing with the Office, which includes a duty to disclose to the Office all information known to that individual to be material to patentability as defined in this section. The duty to disclose information exists with respect to each pending claim until the claim is canceled or withdrawn from consideration, or the application becomes abandoned. Information material to the patentability of a claim that is canceled or withdrawn from consideration need not be submitted if the information is not material to the patentability of any claim remaining under consideration in the application. There is no duty to submit information which is not material to the patentability of any existing claim. The duty to disclose all information known to be material to patentability is deemed to be satisfied if all information known to be material to patentability of any claim issued in a patent was cited by the Office or submitted to the Office in the manner prescribed by §§ 1.97(b)-(d) and 1.98. However, no patent will be granted on an application in connection with which fraud on the Office was practiced or attempted or the duty of disclosure was violated through bad faith or intentional misconduct. The Office encourages applicants to carefully examine:

(1) prior art cited in search reports of a foreign patent office in a counterpart application, and

(2) the closest information over which individuals associated with the filing or prosecution of a patent application believe any pending claim patentably defines, to make sure that any material information contained therein is disclosed to the Office.

(b) Under this section, information is material to patentability when it is not cumulative to information already of record or being made of record in the application, and

(1) It establishes, by itself or in combination with other information, a prima facie case of unpatentability of a claim; or

(2) It refutes, or is inconsistent with, a position the applicant takes in:

(i) Opposing an argument of unpatentability relied on by the Office, or

(ii) Asserting an argument of patentability.

A prima facie case of unpatentability is established when the information compels a conclusion that a claim is unpatentable under the preponderance of evidence, burden-of-proof standard, giving each term in the claim its broadest reasonable construction consistent with the specification, and before any consideration is given to evidence which may be submitted in an attempt to establish a contrary conclusion of patentability.

(c) Individuals associated with the filing or prosecution of a patent application within the meaning of this section are:

(1) Each inventor named in the application:

(2) Each attorney or agent who prepares or prosecutes the application; and

(3) Every other person who is substantively involved in the preparation or prosecution of the application and who is associated with the inventor, with the assignee or with anyone to whom there is an obligation to assign the application.

(d) Individuals other than the attorney, agent or inventor may comply with this section by disclosing information to the attorney, agent, or inventor.

SCHWEGMAN ■ LUNDBERG ■ WOESSNER

United States Patent Application

SUBSTITUTE COMBINED REISSUE DECLARATION AND POWER OF ATTORNEY

As a below named inventor I hereby declare that: my residence, post office address and citizenship are as stated below next to my name; that

I verily believe I am the original, first and joint inventor of the subject matter which is claimed and for which a patent is sought on the invention entitled: **APPARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS FOR A MULTIMEDIA SYSTEM, AND METHOD AND SYSTEM TO ORDER AN ITEM USING A DISTRIBUTED COMPUTING SYSTEM**,

the specification of which was filed on July 10, 2001 as application serial no. 09/903,457.

I believe original patent 5,819,034 ("the '034 patent"), to be wholly or partly inoperative by reason of my claiming less than I had the right to claim in the patent. The claims of the '034 patent relate to a distributed computer system. For example, claim 1 recites a distributed computer system reciting, inter alia, a "further processor including means to . . . form an interactive video program in which execution of said distributed computing application alters said video program." However, the '034 patent also discloses a method and system that, stated generally, uses a client system to facilitate the determining of an item identity for an item to which an order request pertains, automatically retrieving personal information previously stored in a permanent memory in the client system, and causing an order to be placed, where the order including the item identity and the retrieved personal information. This invention is distinct from the invention claimed in the original patent; and is not in any way claimed in the issued claims of the '034 patent. The above quoted language of issued claim 1 is not necessary for patentability of claims drawn to the identified disclosed but unclaimed invention, and thus the presence of this limitation renders the '034 patent partly inoperative. This error is addressed in this reissue by eliminating limitations found in the issued claims, including the limitation from issued claim 1 of the '034 patent quoted above, and by including claims directed to methods of, and systems for, facilitating ordering an item, where the order includes the item identity and the retrieved previously stored personal information. In particular, the error is addressed by the presentation of claims 165-167, 185, 218-220, 236, 252, and 256-261, drawn to this previously unclaimed invention.

I hereby state that I have reviewed and understand the contents of the above-identified specification, including the claims, as amended by any amendment referred to above.

I acknowledge the duty to disclose information which is material to patentability of this application in accordance with 37 C.F.R. § 1.56 (attached hereto). I also acknowledge my duty to disclose all information known to be material to patentability which became available between a filing date of a prior application and the national or PCT international filing date in the event this is a Continuation-In-Part application in accordance with 37 C.F.R. § 1.63(e).

I hereby claim foreign priority benefits under 35 U.S.C. §119(a)-(d) or 365(b) of any foreign application(s) for patent or inventor's certificate, or 365(a) of any PCT international application which designated at least one country other than the United States of America, listed below and have also identified below any foreign application for patent or inventor's certificate having a filing date before that of the application on the basis of which priority is claimed:

No such claim for priority is being made at this time.

I hereby claim the benefit under 35 U.S.C. § 119(e) of any United States provisional application(s) listed below:

No such claim for priority is being made at this time.

I hereby claim the benefit under 35 U.S.C. § 120 or 365(c) of any United States and PCT international application(s) listed below and, insofar as the subject matter of each of the claims of this application is not disclosed in the prior United States or PCT international application in the manner provided by the first paragraph of 35 U.S.C. § 112, I acknowledge the duty to disclose material information as defined in 37 C.F.R. § 1.56(a) which became available between the filing date of the prior application and the national or PCT international filing date of this application:

Application Number	Filing Date	Status
09/672,523	**September 27, 2000**	**Pending**

I hereby appoint the attorneys associated with the customer number listed below to prosecute this application and to transact all business in the Patent and Trademark Office connected herewith:

Customer Number: 44367

I hereby authorize them to act and rely on instructions from and communicate directly with the person/assignee/attorney/firm/organization/who/which first sends/sent this case to them and by whom/which I hereby declare that I have consented after full disclosure to be represented unless/until I instruct Schwegman, Lundberg & Woessner, P.A. to the contrary.

Please direct all correspondence in this case to **Schwegman, Lundberg, & Woessner, P.A.** at the address indicated below:

Customer Number: 44367

I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

Full Name of joint inventor number 1: **Kuriacose Joseph**
Citizenship: **United States of America** Residence: **Gaithersburg, MD**
Post Office Address: 16124 Orchard Grove Road
Gaithersburg, MD 20878

Signature: _____ Date: _____
Kuriacose Joseph

Full Name of joint inventor number 2: **Ansley Wayne Jessup**
Citizenship: **United States of America** Residence: **Willingboro, NJ**
Post Office Address: 22 Elmwood Lane
Willingboro, NJ 08046

Signature: Ansley W Jessup Date: May 27, 2010
Ansley Wayne Jessup

Full Name of joint inventor number 3: **Vincent Dureau**
Citizenship: **France** Residence: **Palo Alto, CA**
Post Office Address: 3519 S. Court
Palo Alto, CA 94306

Signature: _____ Date: _____
Vincent Dureau

X Additional inventors are being named on separately numbered sheets, attached hereto

Full Name of joint inventor number 4: **Alain Delpuch**
Citizenship: **France** Residence: **Paris, France**
Post Office Address: 36 rue Le Brun
Paris, 75013
France

Signature: _____ Date: _____
Alain Delpuch

§ 1.56 Duty to disclose information material to patentability.

(a) A patent by its very nature is affected with a public interest. The public interest is best served, and the most effective patent examination occurs when, at the time an application is being examined, the Office is aware of and evaluates the teachings of all information material to patentability. Each individual associated with the filing and prosecution of a patent application has a duty of candor and good faith in dealing with the Office, which includes a duty to disclose to the Office all information known to that individual to be material to patentability as defined in this section. The duty to disclose information exists with respect to each pending claim until the claim is canceled or withdrawn from consideration, or the application becomes abandoned. Information material to the patentability of a claim that is canceled or withdrawn from consideration need not be submitted if the information is not material to the patentability of any claim remaining under consideration in the application. There is no duty to submit information which is not material to the patentability of any existing claim. The duty to disclose all information known to be material to patentability is deemed to be satisfied if all information known to be material to patentability of any claim issued in a patent was cited by the Office or submitted to the Office in the manner prescribed by §§ 1.97(b)-(d) and 1.98. However, no patent will be granted on an application in connection with which fraud on the Office was practiced or attempted or the duty of disclosure was violated through bad faith or intentional misconduct. The Office encourages applicants to carefully examine:

(1) prior art cited in search reports of a foreign patent office in a counterpart application, and

(2) the closest information over which individuals associated with the filing or prosecution of a patent application believe any pending claim patentably defines, to make sure that any material information contained therein is disclosed to the Office.

(b) Under this section, information is material to patentability when it is not cumulative to information already of record or being made of record in the application, and

(1) It establishes, by itself or in combination with other information, a prima facie case of unpatentability of a claim; or

(2) It refutes, or is inconsistent with, a position the applicant takes in:

(i) Opposing an argument of unpatentability relied on by the Office, or

(ii) Asserting an argument of patentability.

A prima facie case of unpatentability is established when the information compels a conclusion that a claim is unpatentable under the preponderance of evidence, burden-of-proof standard, giving each term in the claim its broadest reasonable construction consistent with the specification, and before any consideration is given to evidence which may be submitted in an attempt to establish a contrary conclusion of patentability.

(c) Individuals associated with the filing or prosecution of a patent application within the meaning of this section are:

(1) Each inventor named in the application:

(2) Each attorney or agent who prepares or prosecutes the application; and

(3) Every other person who is substantively involved in the preparation or prosecution of the application and who is associated with the inventor, with the assignee or with anyone to whom there is an obligation to assign the application.

(d) Individuals other than the attorney, agent or inventor may comply with this section by disclosing information to the attorney, agent, or inventor.

SCHWEGMAN ■ LUNDBERG ■ WOESSNER

United States Patent Application

SUBSTITUTE COMBINED REISSUE DECLARATION AND POWER OF ATTORNEY

As a below named inventor I hereby declare that: my residence, post office address and citizenship are as stated below next to my name; that

I verily believe I am the original, first and joint inventor of the subject matter which is claimed and for which a patent is sought on the invention entitled: **APPARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS FOR A MULTIMEDIA SYSTEM, AND METHOD AND SYSTEM TO ORDER AN ITEM USING A DISTRIBUTED COMPUTING SYSTEM**,

the specification of which was filed on July 10, 2001 as application serial no. 09/903,457.

I believe original patent 5,819,034 ("the '034 patent"), to be wholly or partly inoperative by reason of my claiming less than I had the right to claim in the patent. The claims of the '034 patent relate to a distributed computer system. For example, claim 1 recites a distributed computer system reciting, inter alia, a "further processor including means to . . . form an interactive video program in which execution of said distributed computing application alters said video program." However, the '034 patent also discloses a method and system that, stated generally, uses a client system to facilitate the determining of an item identity for an item to which an order request pertains, automatically retrieving personal information previously stored in a permanent memory in the client system, and causing an order to be placed, where the order including the item identity and the retrieved personal information. This invention is distinct from the invention claimed in the original patent; and is not in any way claimed in the issued claims of the '034 patent. The above quoted language of issued claim 1 is not necessary for patentability of claims drawn to the identified disclosed but unclaimed invention, and thus the presence of this limitation renders the '034 patent partly inoperative. This error is addressed in this reissue by eliminating limitations found in the issued claims, including the limitation from issued claim 1 of the '034 patent quoted above, and by including claims directed to methods of, and systems for, facilitating ordering an item, where the order includes the item identity and the retrieved previously stored personal information. In particular, the error is addressed by the presentation of claims 165-167, 185, 218-220, 236, 252, and 256-261, drawn to this previously unclaimed invention.

I hereby state that I have reviewed and understand the contents of the above-identified specification, including the claims, as amended by any amendment referred to above.

I acknowledge the duty to disclose information which is material to patentability of this application in accordance with 37 C.F.R. § 1.56 (attached hereto). I also acknowledge my duty to disclose all information known to be material to patentability which became available between a filing date of a prior application and the national or PCT international filing date in the event this is a Continuation-In-Part application in accordance with 37 C.F.R. § 1.63(e).

I hereby claim foreign priority benefits under 35 U.S.C. §119(a)-(d) or 365(b) of any foreign application(s) for patent or inventor's certificate, or 365(a) of any PCT international application which designated at least one country other than the United States of America, listed below and have also identified below any foreign application for patent or inventor's certificate having a filing date before that of the application on the basis of which priority is claimed:

No such claim for priority is being made at this time.

I hereby claim the benefit under 35 U.S.C. § 119(e) of any United States provisional application(s) listed below:

No such claim for priority is being made at this time.

I hereby claim the benefit under 35 U.S.C. § 120 or 365(c) of any United States and PCT international application(s) listed below and. insofar as the subject matter of each of the claims of this application is not disclosed in the prior United States or PCT international application in the manner provided by the first paragraph of 35 U.S.C. § 112, I acknowledge the duty to disclose material information as defined in 37 C.F.R. § 1.56(a) which became available between the filing date of the prior application and the national or PCT international filing date of this application:

Application Number	Filing Date	Status
09/672,523	**September 27, 2000**	**Pending**

I hereby appoint the attorneys associated with the customer number listed below to prosecute this application and to transact all business in the Patent and Trademark Office connected herewith:

Customer Number: 44367

I hereby authorize them to act and rely on instructions from and communicate directly with the person/assignee/attorney/firm/organization/who/which first sends/sent this case to them and by whom/which I hereby declare that I have consented after full disclosure to be represented unless/until I instruct Schwegman, Lundberg & Woessner, P.A. to the contrary.

Please direct all correspondence in this case to **Schwegman, Lundberg, & Woessner, P.A.** at the address indicated below:

Customer Number: 44367

I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

Full Name of joint inventor number 1: **Kuriacose Joseph**
Citizenship: **United States of America** Residence: **Gaithersburg, MD**
Post Office Address: 16124 Orchard Grove Road
Gaithersburg, MD 20878

Signature: _____ Date: _____
Kuriacose Joseph

Full Name of joint inventor number 2: **Ansley Wayne Jessup**
Citizenship: **United States of America** Residence: **Willingboro, NJ**
Post Office Address: 22 Elmwood Lane
Willingboro, NJ 08046

Signature: _____ Date: _____
Ansley Wayne Jessup

Full Name of joint inventor number 3: **Vincent Dureau**
Citizenship: **France** Residence: **Palo Alto, CA**
Post Office Address: 3519 S. Court
Palo Alto, CA 94306

Signature: _____ Date: 05/20/10
Vincent Dureau

X Additional inventors are being named on separately numbered sheets, attached hereto.

Full Name of joint inventor number 4: **Alain Delpuch**
Citizenship: France
Post Office Address: 36 rue Le Brun
Paris, 75013
France

Residence: **Paris, France**

Signature: _____ Date: _____
Alain Delpuch

§ 1.56 Duty to disclose information material to patentability.

(a) A patent by its very nature is affected with a public interest. The public interest is best served, and the most effective patent examination occurs when, at the time an application is being examined, the Office is aware of and evaluates the teachings of all information material to patentability. Each individual associated with the filing and prosecution of a patent application has a duty of candor and good faith in dealing with the Office, which includes a duty to disclose to the Office all information known to that individual to be material to patentability as defined in this section. The duty to disclose information exists with respect to each pending claim until the claim is canceled or withdrawn from consideration, or the application becomes abandoned. Information material to the patentability of a claim that is canceled or withdrawn from consideration need not be submitted if the information is not material to the patentability of any claim remaining under consideration in the application. There is no duty to submit information which is not material to the patentability of any existing claim. The duty to disclose all information known to be material to patentability is deemed to be satisfied if all information known to be material to patentability of any claim issued in a patent was cited by the Office or submitted to the Office in the manner prescribed by §§ 1.97(b)-(d) and 1.98. However, no patent will be granted on an application in connection with which fraud on the Office was practiced or attempted or the duty of disclosure was violated through bad faith or intentional misconduct. The Office encourages applicants to carefully examine:

(1) prior art cited in search reports of a foreign patent office in a counterpart application, and

(2) the closest information over which individuals associated with the filing or prosecution of a patent application believe any pending claim patentably defines, to make sure that any material information contained therein is disclosed to the Office.

(b) Under this section, information is material to patentability when it is not cumulative to information already of record or being made of record in the application, and

(1) It establishes, by itself or in combination with other information, a prima facie case of unpatentability of a claim; or

(2) It refutes, or is inconsistent with, a position the applicant takes in:

(i) Opposing an argument of unpatentability relied on by the Office, or

(ii) Asserting an argument of patentability.

A prima facie case of unpatentability is established when the information compels a conclusion that a claim is unpatentable under the preponderance of evidence, burden-of-proof standard, giving each term in the claim its broadest reasonable construction consistent with the specification, and before any consideration is given to evidence which may be submitted in an attempt to establish a contrary conclusion of patentability.

(c) Individuals associated with the filing or prosecution of a patent application within the meaning of this section are:

(1) Each inventor named in the application:

(2) Each attorney or agent who prepares or prosecutes the application; and

(3) Every other person who is substantively involved in the preparation or prosecution of the application and who is associated with the inventor, with the assignee or with anyone to whom there is an obligation to assign the application.

(d) Individuals other than the attorney, agent or inventor may comply with this section by disclosing information to the attorney, agent, or inventor.

SCHWEGMAN ■ LUNDBERG ■ WOESSNER

United States Patent Application

SUBSTITUTE COMBINED REISSUE DECLARATION AND POWER OF ATTORNEY

As a below named inventor I hereby declare that: my residence, post office address and citizenship are as stated below next to my name; that

I verily believe I am the original, first and joint inventor of the subject matter which is claimed and for which a patent is sought on the invention entitled: **APPARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS FOR A MULTIMEDIA SYSTEM, AND METHOD AND SYSTEM TO ORDER AN ITEM USING A DISTRIBUTED COMPUTING SYSTEM**,

the specification of which was filed on July 10, 2001 as application serial no. 09/903,457.

I believe original patent 5,819,034 ("the '034 patent"), to be wholly or partly inoperative by reason of my claiming less than I had the right to claim in the patent. The claims of the '034 patent relate to a distributed computer system. For example, claim 1 recites a distributed computer system reciting, inter alia, a "further processor including means to . . . form an interactive video program in which execution of said distributed computing application alters said video program." However, the '034 patent also discloses a method and system that, stated generally, uses a client system to facilitate the determining of an item identity for an item to which an order request pertains, automatically retrieving personal information previously stored in a permanent memory in the client system, and causing an order to be placed, where the order including the item identity and the retrieved personal information. This invention is distinct from the invention claimed in the original patent; and is not in any way claimed in the issued claims of the '034 patent. The above quoted language of issued claim 1 is not necessary for patentability of claims drawn to the identified disclosed but unclaimed invention, and thus the presence of this limitation renders the '034 patent partly inoperative. This error is addressed in this reissue by eliminating limitations found in the issued claims, including the limitation from issued claim 1 of the '034 patent quoted above, and by including claims directed to methods of, and systems for, facilitating ordering an item, where the order includes the item identity and the retrieved previously stored personal information. In particular, the error is addressed by the presentation of claims 165-167, 185, 218-220, 236, 252, and 256-261, drawn to this previously unclaimed invention.

I hereby state that I have reviewed and understand the contents of the above-identified specification, including the claims, as amended by any amendment referred to above.

I acknowledge the duty to disclose information which is material to patentability of this application in accordance with 37 C.F.R. § 1.56 (attached hereto). I also acknowledge my duty to disclose all information known to be material to patentability which became available between a filing date of a prior application and the national or PCT international filing date in the event this is a Continuation-In-Part application in accordance with 37 C.F.R. § 1.63(e).

I hereby claim foreign priority benefits under 35 U.S.C. §119(a)-(d) or 365(b) of any foreign application(s) for patent or inventor's certificate, or 365(a) of any PCT international application which designated at least one country other than the United States of America, listed below and have also identified below any foreign application for patent or inventor's certificate having a filing date before that of the application on the basis of which priority is claimed:

No such claim for priority is being made at this time.

I hereby claim the benefit under 35 U.S.C. § 119(e) of any United States provisional application(s) listed below:

No such claim for priority is being made at this time.

I hereby claim the benefit under 35 U.S.C. § 120 or 365(c) of any United States and PCT international application(s) listed below and, insofar as the subject matter of each of the claims of this application is not disclosed in the prior United States or PCT international application in the manner provided by the first paragraph of 35 U.S.C. § 112, I acknowledge the duty to disclose material information as defined in 37 C.F.R. § 1.56(a) which became available between the filing date of the prior application and the national or PCT international filing date of this application:

Application Number	Filing Date	Status
09/672,523	**September 27, 2000**	**Pending**

I hereby appoint the attorneys associated with the customer number listed below to prosecute this application and to transact all business in the Patent and Trademark Office connected herewith:

Customer Number: 44367

I hereby authorize them to act and rely on instructions from and communicate directly with the person/assignee/attorney/firm/organization/who/which first sends/sent this case to them and by whom/which I hereby declare that I have consented after full disclosure to be represented unless/until I instruct Schwegman, Lundberg & Woessner, P.A. to the contrary.

Please direct all correspondence in this case to **Schwegman, Lundberg, & Woessner, P.A.** at the address indicated below:

Customer Number: 44367

I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

Full Name of joint inventor number 1: **Kuriacose Joseph**
Citizenship: **United States of America** Residence: **Gaithersburg, MD**
Post Office Address: 16124 Orchard Grove Road
Gaithersburg, MD 20878

Signature: _____ Date: _____
Kuriacose Joseph

Full Name of joint inventor number 2: **Ansley Wayne Jessup**
Citizenship: **United States of America** Residence: **Willingboro, NJ**
Post Office Address: 22 Elmwood Lane
Willingboro, NJ 08046

Signature: _____ Date: _____
Ansley Wayne Jessup

Full Name of joint inventor number 3: **Vincent Dureau**
Citizenship: **France** Residence: **Palo Alto, CA**
Post Office Address: 3519 S. Court
Palo Alto, CA 94306

Signature: _____ Date: _____
Vincent Dureau

X Additional inventors are being named on separately numbered sheets, attached hereto.

Full Name of joint inventor number 4: **Alain Delpuch**
Citizenship: **France** Residence: **Paris, France**
Post Office Address: 36 rue Le Brun
Paris, 75013
France

Signature: _____ Date: April 29th, 2010
Alain Delpuch

§ 1.56 Duty to disclose information material to patentability.

(a) A patent by its very nature is affected with a public interest. The public interest is best served, and the most effective patent examination occurs when, at the time an application is being examined, the Office is aware of and evaluates the teachings of all information material to patentability. Each individual associated with the filing and prosecution of a patent application has a duty of candor and good faith in dealing with the Office, which includes a duty to disclose to the Office all information known to that individual to be material to patentability as defined in this section. The duty to disclose information exists with respect to each pending claim until the claim is canceled or withdrawn from consideration, or the application becomes abandoned. Information material to the patentability of a claim that is canceled or withdrawn from consideration need not be submitted if the information is not material to the patentability of any claim remaining under consideration in the application. There is no duty to submit information which is not material to the patentability of any existing claim. The duty to disclose all information known to be material to patentability is deemed to be satisfied if all information known to be material to patentability of any claim issued in a patent was cited by the Office or submitted to the Office in the manner prescribed by §§ 1.97(b)-(d) and 1.98. However, no patent will be granted on an application in connection with which fraud on the Office was practiced or attempted or the duty of disclosure was violated through bad faith or intentional misconduct. The Office encourages applicants to carefully examine:

(1) prior art cited in search reports of a foreign patent office in a counterpart application, and

(2) the closest information over which individuals associated with the filing or prosecution of a patent application believe any pending claim patentably defines, to make sure that any material information contained therein is disclosed to the Office.

(b) Under this section, information is material to patentability when it is not cumulative to information already of record or being made of record in the application, and

(1) It establishes, by itself or in combination with other information, a prima facie case of unpatentability of a claim; or

(2) It refutes, or is inconsistent with, a position the applicant takes in:

(i) Opposing an argument of unpatentability relied on by the Office, or

(ii) Asserting an argument of patentability.

A prima facie case of unpatentability is established when the information compels a conclusion that a claim is unpatentable under the preponderance of evidence, burden-of-proof standard, giving each term in the claim its broadest reasonable construction consistent with the specification, and before any consideration is given to evidence which may be submitted in an attempt to establish a contrary conclusion of patentability.

(c) Individuals associated with the filing or prosecution of a patent application within the meaning of this section are:

(1) Each inventor named in the application:

(2) Each attorney or agent who prepares or prosecutes the application; and

(3) Every other person who is substantively involved in the preparation or prosecution of the application and who is associated with the inventor, with the assignee or with anyone to whom there is an obligation to assign the application.

(d) Individuals other than the attorney, agent or inventor may comply with this section by disclosing information to the attorney, agent, or inventor.

Evidence Appendix 2.a.

Papers from the prosecution history of U.S. patent no. 5,819,034: Office Action mailed June 17, 1996

08/233,908

UNITED STATES DEPARTMENT OF COMMERCE
Patent and Trademark Office
Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D.C. 20231

SERIAL NUMBER	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.
08/233,908	04/28/94	JOSEPH	

EXAMINER	
NGUYEN, D	
ART UNIT	PAPER NUMBER
2302	6

83MI/0617

JOSEPH S TRIPOLI
PATENT OPERATIONS - GE AND RCA
LICENSING MANAGEMENT OPERATION INC
CN 5312
PRINCETON NJ 08543-0028

DATE MAILED: 06/17/96

This is a communication from the examiner in charge of your application.
COMMISSIONER OF PATENTS AND TRADEMARKS

☑ This application has been examined ☐ Responsive to communication filed on _____ ☐ This action is made final.

A shortened statutory period for response to this action is set to expire 3 month(s), — days from the date of this letter. Failure to respond within the period for response will cause the application to become abandoned. 35 U.S.C. 133

Part I THE FOLLOWING ATTACHMENT(S) ARE PART OF THIS ACTION:

1. ☑ Notice of References Cited by Examiner, PTO-892.
2. ☑ Notice of Draftsman's Patent Drawing Review, PTO-948.
3. ☑ Notice of Art Cited by Applicant, PTO-1449.
4. ☐ Notice of Informal Patent Application, PTO-152.
5. ☐ Information on How to Effect Drawing Changes, PTO-1474.
6. ☐ _____

Part II SUMMARY OF ACTION

1. ☑ Claims 1-20 are pending in the application.
   Of the above, claims _____ are withdrawn from consideration.
2. ☐ Claims _____ have been cancelled.
3. ☐ Claims _____ are allowed.
4. ☑ Claims 1-20 are rejected.
5. ☐ Claims _____ are objected to.
6. ☐ Claims _____ are subject to restriction or election requirement.
7. ☑ This application has been filed with ~~informal~~ informal/formal drawings under 37 C.F.R. 1.85 which are acceptable for examination purposes.
8. ☐ Formal drawings are required in response to this Office action.
9. ☐ The corrected or substitute drawings have been received on _____. Under 37 C.F.R. 1.84 these drawings are ☐ acceptable; ☐ not acceptable (see explanation or Notice of Draftsman's Patent Drawing Review, PTO-948).
10. ☐ The proposed additional or substitute sheet(s) of drawings, filed on _____, has (have) been ☐ approved by the examiner; ☐ disapproved by the examiner (see explanation).
11. ☐ The proposed drawing correction, filed _____, has been ☐ approved; ☐ disapproved (see explanation).
12. ☐ Acknowledgement is made of the claim for priority under 35 U.S.C. 119. The certified copy has ☐ been received ☐ not been received ☐ been filed in parent application, serial no. _____; filed on _____.
13. ☐ Since this application apppears to be in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11; 453 O.G. 213.
14. ☑ Other See attached.

EXAMINER'S ACTION

PTOL-326 (Rev. 2/93)

1. Claims 1-20 are presented for examination.

2. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed. The current title is imprecise.

3. Applicant is reminded of the proper language and format of an Abstract of the Disclosure.

The abstract should be in narrative form and generally limited to a single paragraph on a separate sheet within the range of 50 to 250 words. It is important that the abstract not exceed 250 words in length since the space provided for the abstract on the computer tape used by the printer is limited. The form and legal phraseology often used in patent claims, such as "means" and "said", should be avoided. The abstract should describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

The language should be clear and concise and should not repeat information given in the title. It should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," *etc.*

The abstract contains a word "disclosed". Correction is required.

4. Claims 1-9 are rejected under 35 USC § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

I. The following terms lack proper antecedent basis:

"the data stream" should read "the continuous data stream"- claims 1 and thereafter.

5. The following is a quotation of 35 USC § 103 which forms the basis for all obviousness rejections set forth in this Office action:

A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Subject matter developed by another person, which qualifies as prior art only under subsection (f) or (g) of section 102 of this title, shall not preclude patentability under this section where the subject matter and the claimed invention were, at the time the invention was made, owned by the same person or subject to an obligation of assignment to the same person.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. § 103, the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 C.F.R. § 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of potential 35 U.S.C. § 102(f) or (g) prior art under 35 U.S.C. § 103.

6. Claims 1-20 are rejected under 35 USC § 103 as being unpatentable over Acampora et al US. patent (5,168, 356) and Harley et al, US.patent (4,965,825).

7. As to claim 1, Acampora et al. disclosed the invention substantially as claimed, including a data processing system comprising:

a. a source of continuous data stream repetitively including data representing a distributed computing application (see abstract);

b. a client computer [server], receiving data stream, extracting the distributed computing application representative data form data stream, and executing the extracted distributed computing application (see fig.7).

8. As to claims 10-11, Acampora et al. disclosed the invention substantially as claimed, including a data processing system comprising: an input terminal [55], a processing unit [110, 210 and 310], a system bus[55], a read/write memory [350], a data stream input/output adapter [100, 200, 300] and a processor [CPU] (see fig.1).

9. As to claims 1 and 10, Acampora et al did not disclose a data stream receiver for receiving and extracting the distributed computing application. However, Harley taught the

data stream receiver [jack port to external equipment] for receiving and extracting the distributed computing application (see fig. 2)

10. As to claims 2 and 12-13, Harley et al taught an auxiliary data processor [200] and wherein the data stream source produces the data stream and auxiliary data (see figs. 2 and 2d). The client computer extracts the auxiliary data from the data stream and supplies it to the auxiliary data processor. The auxiliary data is video and audio [radio and video signals) (see fig. 3).

11. As to claim 3, Harley taught that the data stream is in form of a series of packets (see figs. 2E-K). The first one of the series packets contains data representing the distributed computing application and includes identification information indicating that the first one of the series of packets contains data representing the distributed computing application (see figs 2e-K). The second one of the series packets contains auxiliary data [audio and video signals] and includes identification information [meter monitor segment] indicating that the second one of the series of packets contains auxiliary data (see figs. 2E-K).

12. As to claim 4, Harley et al taught that the data stream source simultaneously produces a plurality of continuous data

streams, each repetitively including data representing a respective distributed computing application; and client computer includes a data receiver for selectively receiving one of the plurality of data streams and extracting the distributed computing application representative data included in the selected one of the data steams (see fig. 3).

13. As to claim 5, Harley et al taught an data processor [398]. The stream source produces auxiliary data [audio and video signals]. The client computer extracts the auxiliary data from the data stream and supplies it to the auxiliary data processor (see fig. 3A).

14. As to claims 6 and 8, Harley taught that the data stream source produces the data stream in the form of a series of packets comprising a executable code module [execution segment] and identification information [meter monitor segment] indicating that the first one of the series packets contains data representing the executable code module. The second one of the series packets contains data representing the data module [information segment] and includes an identification information indicating that the second one of the series of packets contains data representing the data module and the third one of the series of packets contains auxiliary data [audio and video signals] and includes identification information indicating that the third one

of the series of packets contains auxiliary data. The fourth one of the series of packets contains auxiliary data and includes identification information indicating that the third one of the series of packets contains auxiliary data (see figs. 2E-K and col.24 line 63 to col. 38 line 10).

15. As to claims 7, 9 and 10-11, Harley et al taught an input terminal [12 and 14], a data stream receiver [30 and 40], a processing unit [205], a system bus [jack port bus], a read/write memory [20-21] ,a data stream input/output adapter [22] and a processor 16] (see fig. 2).

16. As to claim 12, Harley taught that input terminal [22] receives series of packets in the data stream (see fig. 2).

17. As to claim 15, Harley taught a data stream selector [2] and a distributed computing representative data extractor (see fig. 2).

18. As to claim 16, Harley taught that the data stream selector comprises a selection control unit terminal [8] and the processing unit [16] (see fig. 2).

19. As to claims 17-19, Harley et al. taught an executable code module [execution segment] (see fig. 2E), a directory module

[200] and a data module [205] (see fig. 2D).

20. As o claim 20, Harley et al taught that the distributed computing application is divided into a plurality of modules and the processing unit stores only modules of the plurality of modules those are necessary to execute the current portion of the application (see fig. 2D).

21. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Acampora et al and Harley et al. because the both directly concern a distributed system. Moreover, it would have been obvious for one of ordinary skill in the art at the time the invention was made to incorporate the teaching of Harley et al into the system taught by Acampora et al because the combination system would improve the system taught by Acampora et al by processing the execution in every one of a client server.

22. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

a. Jacobson et al, US. patent (5,440,744).

b. Masai et al, US. patent (4,937,784).

c. Smith, US. patent (5,129,080).

23. Any inquiry concerning this communication or earlier communications from the Examiner should be directed to Dzung Nguyen whose telephone number is (703) 305-9695.

Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 305-9600.

D. Nguyen

June 10, 1994

ERIC COLEMAN
PRIMARY EXAMINER
GROUP 2300

Evidence Appendix 2. b.

Papers from the prosecution history of U.S. patent no. 5, 819,034: Response to the June 17, 1996 Office Action (Amendment A)

2302
#7/A
J. Epps
10/4/96

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant : Kuriacose Joseph et al.

Serial No. : 08/233,908

Filed : April 28, 1994

For : A DISTRIBUTED COMPUTER SYSTEM

Examiner : D. Nguyen

Art Unit : 2302

RECEIVED
OCT 04 1996
GROUP 2300

AMENDMENT PURSUANT TO 37 CFR 1.111 AND PETITION FOR EXTENSION OF TIME FOR FILING RESPONSE

Hon. Assistant Commissioner for Patents
Washington, D.C. 20231

Sir:

PETITION

Applicant herewith petitions the Commissioner of Patents and Trademarks to extend, in the above identified application, the time for response to the Office Action dated 06/17/96 for one month from 09/17/96 to 10/17/96. Please charge deposit account 07-0832 in the amount of $110.00 to cover the cost of the extension. Any deficiency or overpayment should be charged or credited to the above numbered deposit account.

AMENDMENT

In response to the Office Action dated 06/17/96, which is directed to the above identified application, please amend such application as follows.

IN THE TITLE

Rewrite the Title as follows --APPARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS FOR A MULTIMEDIA SYSTEM--

290 SB 07-0832 10/02/96 08233908
00186 115 110.00CH

IN THE CLAIMS

1. (AMENDED) A distributed computer system comprising:

a source of a [continuous] data stream [repetitively] including data representing a distributed computing application, which distributed computing application is repetitively transmitted independent of receiving client computer apparatus; and

a client computer, receiving the data stream, extracting the distributed computing application representative data from the data stream, and executing the extracted distributed computing application.

2. (AMENDED) The computer system of claim 1, further comprising an auxiliary data processor, wherein:

the data stream source produces the data stream further including auxiliary data; and

the client computer, responsive to said distributed computing application, extracts the auxiliary data from the data stream and supplies it to the auxiliary data processor.

3. (AMENDED) The computer system of claim 2, wherein[:]the data stream source produces the data stream in the form of a series of time division multiplexed packets, ones of which contain said auxiliary data and represent a television program, and others of which represent a distributed computing application associated with said television program, and wherein said distributed computing application is repeatedly transmitted during the time that said television program is transmitted; and wherein

[a first one of the series of packets contains data representing the distributed computing application and includes identification information indicating that the first one of the series of packets contains data representing the distributed computing application; and

a second one of the series of packets contains auxiliary data and includes identification information indicating that the second one of the series of packets contains auxiliary data.]

said client computer includes a packet selector for selecting and directing packets containing said auxiliary data representing a

television program to a television signal processor and selecting and directing packets containing said associated distributed computing application to a further processor; and

said further processor including means to assemble said distributed computing application and execute said distributed computing application to form an interactive television program.

a1

4. (AMENDED) The computer system of claim 1, wherein:

the data stream source simultaneously produces a plurality of continuous data streams, each repetitively including data representing a respective distributed computing application;

a first one of the series of packets contains data representing the executable code module and includes identification information indicating that the first one of the series of packets contains data representing the executable code module;

a second one of the series of packets contains data representing the data module and includes identification information indicating that the second one of the series of packets contains data representing the data module; and

a third one of the series of packets contains auxiliary data and includes identification information indicating that the third one of the series of packets contains auxiliary data; and

the client computer further includes a data receiver for selectively receiving one of the plurality of data streams, and extract[ing] the distributed computing application representative data included in the selected one of the data streams and applies it to computer program controlled apparatus, and the client computer extracts the auxiliary data from the data stream and supplies it to an auxiliary data processor.

CANCEL CLAIMS 5 AND 6

a2

7. (AMENDED) The computer system of claim [6] 1, wherein:

the data stream source produces [the] a data stream [further] including a series of packets representing a plurality of time division multiplexed signals, at least one of the packets including a directory module containing information [related to the code module] inter-

relating packets associated with said distributed computing application; and

the client computer first extracts the directory module from the data stream[, then] and using data contained in the directory module extracts said packets associated with said distributed computing application [the code module in response to the information related to the code module in the extracted directory module,] and builds said distributed computing application and executes [the extracted code module] said distributed computing application.

8. (AMENDED) The computer system of claim 1, wherein:

the data stream source produces the data stream in the form of a series of packets;

a first one of the series of packets contains data representing the executable code module and includes identification information indicating that the first one of the series of packets contains data representing the executable code module;

a second one of the series of packets contains data representing the data module and includes identification information indicating that the second one of the series of packets contains data representing the data module;

a third one of the series of packets contains data representing [the] a directory module inter-relating respective transmitted modules associated with a single distributed computing application, and includes identification information indicating that the [second] third one of the series of packets contains data representing the directory module; and

a fourth one of the series of packets contains auxiliary data and includes identification information indicating that the [third] fourth one of the series of packets contains auxiliary data.

9. (AMENDED) The computer system of claim 8, wherein:

the data stream source produces the data stream further including a data module and a directory module [further] which contains information related to the data module; and

the client computer further extracts the data module from the data stream in response to the information related to the data

module in the extracted directory module and executes the extracted code module to process the extracted data module.

10. (AMENDED) In a distributed computer system, a client computer, comprising:

an input terminal, for receiving a [continuous] data stream [repetitively] including data representing a distributed computing application which is repetitively transmitted independently of said client computer, said data stream arranged in a series of packets, at least one of which includes a directory containing information interrelating ones of the packets containing said distributed computing application;

a data stream receiver, coupled to the input terminal, for receiving the data stream, [and] extracting the directory packet and responsive to the directory, extracting packets containing said distributed computing application representative data; and

a processing unit, coupled to the data stream receiver, for [receiving and] assembling said distributed computing application and executing the distributed computing application.

14. (AMENDED) The client computer of claim 13, wherein the distributed computing system is an interactive television system, and the auxiliary data is television video and audio, and said processing unit, responsive to said distributed computing application produces and combines graphics with said television video.

16. (AMENDED) The client computer of claim [15] 10, wherein said data stream includes packets of said distributed computing application multiplexed with packets of video signal, and said data selector comprises:

[the data stream selector comprises a selection control input terminal, and produces the selected one of the plurality of data streams in response to a control signal at the selection control input terminal;]

means for providing separate data streams of said video signal and said distributed computing application; and

the processing unit comprises:

a system bus;

read/write memory, coupled to the system bus;

a data stream input/output adapter, coupled between the data stream receiver and the system bus, for receiving the extracted distributed computing application representative data from the data stream receiver, and storing it in the read/write memory, and having a control output terminal coupled to the selection control input terminal of the data stream selector, for producing the selection control signal; and

a processor, coupled to the system bus, for controlling the data stream input/output device to generate a selection control signal selecting a specified one of the plurality of data streams, and for executing the distributed computing application stored in the read/write memory.

18. (AMENDED) The client computer of claim [17] 10, wherein:

[the input terminal receives] the distributed computing application representative data [further includes] is arranged in modules including a directory module and an executable code module, said [a] directory module containing information related to the executable code module; and

the data stream receiver first extracts the directory module from the data stream;

the processing unit then processes the information related to the executable code module in the directory module;

the data stream receiver then extracts the executable code module from the data stream based on the information related to the executable code module in the extracted directory module; and

the processing unit then executes the extracted executable code module.

Cancel claims 19 and 20.

REMARKS

The title was amended at the examiner's request.

A new Abstract of The Disclosure is attached as requested by the examiner.

Claims 1-4, and 7-18 remain active in this application.

Claims 1-9 were rejected under 35 USC 112 second paragraph for being indefinite. Corrections were made as suggested by the examiner. In view of these corrections reconsideration and withdrawal of the 35 USC 112 rejection to claims 1-9 is requested.

Claims 1-20 were rejected under 35 USC 103 as being unpatentable over Acampora et al (US5168356) and Harley et al (US4965825), which rejections are herein traversed.

First it is believed that the examiner meant to cite Jacobson et al.(US5440744) not Acampora et al., because the reference numerals indicated in the examiners responses comport with those in Jacobson et al and not Acampora et al. Further, Acampora never mentions transmitting and distributed computing application or anything similar. In addition, US4965825 is issued to Harvey et al not Harley et al.

All of the examiner's references to Acampora will be assumed to have been meant to be to Jacobson et al.

Examiner's item 7 of the 6/17/96 OA draws a correspondence between something in the Abstract of Jacobson et al and the claim 1 recitation of, "a source of continuous data stream repetitively including data representing a distributed computing application". There is nothing said in the Abstract of Jacobson about **repetitively including data.**

Claim 1 has been amended at this point to more clearly define the invention and claim 1 now reads in part,

including data representing a distributed computing application, which distributed computing application is ***repetitively transmitted independent of receiving client computer apparatus;***

Examiner's item 7 of the 6/17/96 OA also draws a correspondence between the claim 1 recitation of, "a client computer, receiving the data stream, extracting the distributed computing application representative data from the data stream, and executing the extracted distributed computing application," and Fig. 7. The Jacobson Fig. 7 shows a representation of a Global Data Base with three local Cache units that may interact therewith. There is nothing

suggesting a **client computer, receiving... extracting** and **executing the extracted distributed computing application**. The Fig. 7 of Acampora shows a transmitter/encoder apparatus for assembling data from three sources Audio, Video and Aux. There is nothing suggesting a **client computer, receiving... extracting** and **executing the extracted distributed computing application**.

Acampora does show forming a time division multiplexed packet signal but does not show or suggest including a *distributed computing application is* ***repetitively transmitted independent of receiving client computer.***

Jacobson does show a computer system with multiple receiving apparatus, but is directed to use of object oriented programs in a multi-platform system. The section on signal format (Information Flow) does not suggest repetitively transmitting programs independently of the receivers.

Harvey et al show and discuss a system for transmitting transactional programming code in the VBI of analog TV signals, where it appears that the programming code is associated with particular events of the TV program. The reference does not suggest a system where a *distributed computing application is* ***repetitively transmitted independent of receiving client computer.***

It is recognized that Harvey et al do discuss an interactive TV system wherein transactional programming is transmitted in the VBI of an analog TV signal. However the transactional programming is not contained in a *series of packets, at least one of which includes a directory containing information inter-relating ones of the packets containing said distributed computing application* a la amended claim 3 for example. It appears that the so called "Packets" in the Harvey reference do not include a directory packet, but rather each includes information to be self identifying. See for example Col. 24, line 63 to col. 25, line 5.

A further significant difference between the claimed apparatus and the Harvey et al apparatus is that it appears that the programs used in the Harvey et al. apparatus are resident in the respective receivers, and only data and executable commands are transmitted in the VBI of the TV signals. Note for example col. 8, lines 35, 62; col. 12, lines 35, 37; col. 13, line 48; col. 21, lines 21, 29;

col. 26, line 29, 35; col. 50, line 32; col. 51, line 4; col. 56, lines 45, 54, 57; col. 60, lines 18, 28, 39, 47, 54; etc. In particular see col. 26, lines 28-36. Each instance seems to indicate that the apparatus is **preprogrammed** to cooperate with transmitted information, and that the transmitted information does not include a distributed computing **Application**. This conjecture is supported by the fact that information in the Harvey apparatus is transmitted in one line per frame of video signal. This severely restricts the data rate to a level which would probably preclude transmission of an executable program, of any size, at the commencement of a TV program, and certainly to preclude the repeated transmission of distributed computing applications.

A principal object of this invention is to provide an interactive system in which receivers need not include memory to store a plurality of executable programs (Specification, page 4, line 38 et seq.). This is accomplished by repetitively transmitting the programs so that someone coming online can immediately access the program, download and use same. Apparently Harvey did not address this problem since he, by implication from all the preprogrammed applications, has included mass memory in respective receivers. Alternatively, since he is transmitting digital data in the VBI, cannot achieve this goal.

In view of the foregoing discussion and the amendment to claim 1, reconsideration and withdrawal of the 35 USC 103 rejection of Claim 1 is requested.

Claim 2 is patentable for at least the same reasons as claim 1 from which it depends.

Claim 3 recites in part, "time division multiplexed packets, ones of which contain said auxiliary data and represent a television program, and others of which represent a distributed computing application associated with said television program, and wherein said distributed computing application is repeatedly transmitted during the time that said television program is transmitted; and wherein

said client computer includes a packet selector for selecting and directing packets containing said auxiliary data representing a

television program to a television signal processor and selecting and directing packets containing said associated distributed computing application to a further processor; and

said further processor including means to assemble said distributed computing application and execute said distributed computing application to form an interactive television program."

The references do not show or suggest a packet signal of time division multiplexed TV signal and associatcd distributed computer programs where the distributed computing application is repeatedly transmitted during the time that said television program is transmitted; nor a client computer for selecting and directing packets containing auxiliary data to a television signal processor and selecting and directing packets containing said associated distributed computing application to a further processor.

Absent these features the references cannot render claim 3 unpatentable and therefor in view of the foregoing discussion and the amendment to claim 3, reconsideration and withdrawal of the 35 USC 103 rejection of Claim 3 is requested.

Claim 4 recites in part, " a first one of the series of packets contains data representing the **executable code module** and includes identification information indicating that the first one of the series of packets contains data representing the executable code module;

a second one of the series of packets contains data representing the **data module** and includes identification information indicating that the second one of the series of packets contains data representing the data module; and

a third one of the series of packets contains **auxiliary data** and includes identification information indicating that the third one of the series of packets contains auxiliary data."

The references do not show or suggest such data structure in a *distributed computing application [which] is* ***repetitively transmitted independent of receiving client computer.*** Thus the references cannot render the claim 4 unpatentable. In view of the foregoing discussion and the amendment to claim 4, reconsideration and withdrawal of the 35 USC 103 rejection of Claim 4 is requested.

Claim 7 recites in part, " the data stream source produces a data stream including a series of packets representing a plurality of time division multiplexed signals, at least one of the **packets including a directory module** containing information inter-relating packets associated with said distributed computing application; and

the client computer first **extracts the directory module** from the data stream and **using data contained in the directory module** extracts said packets associated with said distributed computing application **and builds said distributed computing application and executes** said distributed computing application."

The references neither show or suggest a *distributed computing application [which] is* ***repetitively transmitted independent of receiving client computer.*** and includes **packets including a directory module** and a client computer which first **extracts the directory module** from the data stream and **using data contained in the directory module,... builds said distributed computing application and executes** said distributed computing application.

Absent a suggestion of these features in the claimed environment, the references cannot render claim 7 unpatentable.. In view of the foregoing discussion and the amendment to claim 7, reconsideration and withdrawal of the 35 USC 103 rejection of Claim 7 is requested.

Claim 8 includes recitations similar to claim 4 and is patentable for the same reasons set forth regarding claim 4.

Amended Claim 10 recites, "In a distributed computer system, a client computer, comprising:

an input terminal, for receiving a data stream including data representing a distributed computing application which is **repetitively transmitted** independently of said client computer, said data stream arranged in a series of packets, at least one of which includes a **directory containing information inter-relating**

ones of the packets containing said distributed computing application;

a data stream receiver, coupled to the input terminal, for receiving the data stream, extracting the directory packet and responsive to the directory, extracting packets containing said distributed computing application representative data; and

a processing unit, coupled to the data stream receiver, for assembling said distributed computing application and executing the distributed computing application."

The examiner has equated the bus 55 of the Jacobson Fig. 1 apparatus to the claimed input terminal. However, there is no indication in Jacobson that such terminal ever receives a *data stream including data representing a distributed computing application which is repetitively transmitted independently of said client computer,* or that the data stream is *arranged in a series of packets, at least one of which includes a directory containing information inter-relating ones of the packets containing said distributed computing application.*

The Jacobson apparatus does not include a data stream receiver, coupled to the input terminal, for receiving the data stream, extracting the **directory** packet and responsive to the directory, extracting packets containing said distributed computing application. It is admitted that the Jacobson apparatus does include a number of the claimed elements which are necessary constituents of any computer program processing system. However, since Jacobson et al do not show or suggest a *data stream including data representing a distributed computing application which is repetitively transmitted independently of said client computer,* or that the data stream is *arranged in a series of packets, at least one of which includes a directory containing information inter-relating ones of the packets containing said distributed computing application*, the Jacobson et al apparatus cannot be deemed to include apparatus to process the claimed signal. Therefore the Jacobson reference cannot render claim 10 unpatentable. In view of the foregoing discussion and the amendment to claim 10, reconsideration and withdrawal of the 35 USC 103 rejection of Claim 10 is requested.

Claim 11 is patentable for substantially the same reasons set forth for claim 10.

Claims 12 and 13, depending from claims 10 and 12 respectively, are patentable for the same reasons as the claims from which they depend.

Claim 14 recites in part, " wherein the distributed computing system is an interactive television system, and the auxiliary data is television video and audio, and said processing unit, responsive to said distributed computing application produces and combines graphics with said television video."

The references do not suggest a *data stream including data representing a distributed computing application which is repetitively transmitted independently of said client computer,* or that the data stream is *arranged in a series of packets, at least one of which includes a directory containing information inter-relating ones of the packets containing said distributed computing application,* wherein the distributed computing system is an interactive television system, and the auxiliary data is television video and audio, and said processing unit, responsive to said distributed computing application. And see the discussion regarding Harvey et al as applied to claim 1.

In view of the foregoing discussion and the amendment to claim 14 reconsideration and withdrawal of the 35 USC 103 rejection of Claim 14 is requested.

Re. item 10 of the 06/17/96 OA, claims 2 and 12-13 rise or fall with the claims from which they depend.

Re. item 11 of the 06/17/96 OA, it is the understanding of the undersigned that the Harvey reference transmits digital data in the VBI of analog TV signal (col. 47, lines 31-37). Claim 3 recites in part, a "data stream in the form of a series of time division **multiplexed packets, ones of which contain said auxiliary data and represent a television program**, and others of which represent a distributed computing application associated with said television program, and wherein **said distributed computing application is repeatedly transmitted during the time** that said television program is transmitted; and wherein

said client computer includes a packet selector for selecting and directing packets containing said auxiliary data representing a television program to a television signal processor and selecting and directing packets containing said associated distributed computing application to a further processor; and"

The Harvey et al reference does not contemplate time division multiplexed packets of video and packets of **distributed computing application** [which] **is repeatedly transmitted during the time** that said television program is transmitted;

The Harvey so called packets are merely a few bytes of digital information on a line per frame of the video signal. They are referred to as segments in the reference, not packets.

Since the reference does not contemplate the time division multiplexed signal scheme described and claimed, it cannot render the claim 3 unpatentable and therefore reconsideration and withdrawal of the rejection is requested.

Re. item 12 of the 06/17/96 OA, the examiner states that "Harley et al taught that the data stream source simultaneously produces a plurality of continuous data streams, each repetitively including data representing a respective distributed computing application..." Note that parent claim 1 was amended to eliminate any confusion regarding the term **repetitively.** Amended claim 1 recites in pertinent part,

"A distributed computer system comprising:

a source of a data stream including data representing a distributed computing application, which distributed computing application is repetitively transmitted independent of receiving client computer apparatus; and..."

The application is repetitively transmitted. That is the entire application may be transmitted multiple times during, for example, a TV program with which it may be associated. The Harvey reference does not appear to contemplate the repetitive transmission of the computing application (in any event the undersigned could not find reference to such function in the Harvey et al reference).

Re. item 13 of the 06/17/96 OA, Claim 5 has been canceled, mooting item 13.

Re. item 14 of the 06/17/96 OA, Claim 6 has been canceled and claim 8 is patentable for at least the same reasons as claim 1 from which it depends. In addition claim 8 recites in pertinent part, "a third one of the series of packets contains data representing a directory module inter-relating respective transmitted modules associated with a single distributed computing application, and includes identification information indicating that the third one of the series of packets contains data representing the directory module; and..." The Harvey et al does not describe anything which remotely corresponds to **a directory module inter-relating respective transmitted modules associated with a single distributed computing application.** Therefore the Harvey reference cannot render claim 8 unpatentable. Reconsideration and withdrawal of the 35 USC 103 rejection is requested.

Re. item 15 of the 06/17/96 OA, Harvey et al does include the elements itemized in item 15. However they apply to a system different than that claimed in claims 7, 9 and 10-11. The claim apparatus are all responsive to information in a directory module. The Harvey et al apparatus does not contemplate a directory module. Therefore the Harvey reference cannot render claim 8 unpatentable. Reconsideration and withdrawal of the 35 USC 103 rejection is requested.

Re. item 16 of the 06/17/96 OA, see discussion of claim 12 above.

Re. item 17 of the 06/17/96 OA, Claim 15 is patentable for at least the same reasons as claim 10 from which it depends.

Re. item 18 of the 06/17/96 OA, the data selector claimed in claim 16 demultiplexes video signal packets and application packets from the input data stream. Element 8 of Fig. 2 of the Harvey reference "receives said signals from said decoders and other signals from other inputs and organizes the received information in a predetermined fashion. Buffer/comparator 8 has capacity for

comparing a particular portion or portions of inputted information to particular preprogrammed information and for operating in preprogrammed fashions on the basis of results of comparing. It has capacity for detecting particular end of file signals in inputted information and for operating in preprogrammed fashions whenever said information is detected..." The reference describes several other functions none of which are related to demultiplexing packet signals. It is seen that the signals are already separated before they reach element 8. Thus the claimed demultiplexer cannot be equated with element 8 in the reference.

Re. item 19 of the 06/17/96 OA, claim 18 recites in pertinent part, "the distributed computing application representative data is arranged in modules including a **directory module** and an executable code module, said directory module containing information related to the executable code module; and

the data stream receiver first extracts the **directory module** from the data stream;

the processing unit then processes the information related to the executable code module in the **directory module;**

the data stream receiver then extracts the executable code module from the data stream based on the information related to the executable code module in the extracted **directory module;** and

the processing unit then executes the extracted executable code module."

As indicated previously, the Harvey reference does not show or suggest directory modules or anything remotely corresponding to a directory module. Therefore it cannot suggest the directory module processing apparatus recited in claim 18, and reconsideration and withdrawal of the rejection to claim 18 is respectfully requested.

Claims 19 and 20 were canceled so comments directed thereto are moot.

No fee is believed to have been incurred by virtue of this response. However, if a fee is incurred on the basis of this communication, please charge such fee against deposit account 07-0832.

Respectfully Submitted,
KURIACOSE JOSEPH ET AL.

BY: Eric P. Herrmann

Eric P. Herrmann, Attorney
Registration No. 29,169
(609) 734-9754

GE and RCA Licensing Management Operation, Inc.
Patent Operations
CN 5312
Princeton, New Jersey 08543-0028

September 23, 1996

Certificate of Mailing under 37 CFR 1.8

I hereby certify that this correspondence is being deposited with the United States Postal Service as first class mail in a postage paid envelope addressed to: Assistant Commissioner for Patents, Washington, D.C. 20231 on the date indicated below.

Date: 9/23/96 Signature Eric P. Herrmann

Evidence Appendix 2.c.

Papers from the prosecution history of U.S. patent no. 5,819,034: FINAL Office Action mailed December 23, 1996

08/233,908

UNITED STATES DEPARTMENT OF COMMERCE
Patent and Trademark Office
Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D.C. 20231

APPLICATION NUMBER	FILING DATE	FIRST NAMED APPLICANT	ATTORNEY DOCKET NO.
08/233,908	04/28/94	JOSEPH	

B3M1/1223

JOSEPH S TRIPOLI
PATENT OPERATIONS - GE AND RCA
LICENSING MANAGEMENT OPERATION INC
CN 5312
PRINCETON NJ 08543-0028

EXAMINER	
NGUYEN L	

ART UNIT	PAPER NUMBER
2302	10

DATE MAILED: 12/23/96

This is a communication from the examiner in charge of your application.
COMMISSIONER OF PATENTS AND TRADEMARKS

OFFICE ACTION SUMMARY

☒ Responsive to communication(s) filed on 9/23/96

☒ This action is **FINAL**.

☐ Since this application is in condition for allowance except for formal matters, **prosecution as to the merits is closed** in accordance with the practice under *Ex parte Quayle*, 1935 D.C. 11; 453 O.G. 213.

A shortened statutory period for response to this action is set to expire Three (3) month(s), or thirty days, whichever is longer, from the mailing date of this communication. Failure to respond within the period for response will cause the application to become abandoned. (35 U.S.C. § 133). Extensions of time may be obtained under the provisions of 37 CFR 1.136(a).

Disposition of Claims

☒ Claim(s) 1-4 and 7-18 is/are pending in the application.

Of the above, claim(s) _____ is/are withdrawn from consideration.

☐ Claim(s) _____ is/are allowed.

☒ Claim(s) 1-2, 10-15 and 17 is/are rejected.

☒ Claim(s) 3-4, 7-9, 16 and 18 is/are objected to.

☐ Claims _____ are subject to restriction or election requirement.

Application Papers

☐ See the attached Notice of Draftsperson's Patent Drawing Review, PTO-948.

☐ The drawing(s) filed on _____ is/are objected to by the Examiner.

☐ The proposed drawing correction, filed on _____ is ☐ approved ☐ disapproved.

☐ The specification is objected to by the Examiner.

☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119

☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).

☐ All ☐ Some* ☐ None of the CERTIFIED copies of the priority documents have been

☐ received.

☐ received in Application No. (Series Code/Serial Number) _____.

☐ received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

*Certified copies not received: _____.

☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).

Attachment(s)

☐ Notice of Reference Cited, PTO-892

☐ Information Disclosure Statement(s), PTO-1449, Paper No(s). _____

☐ Interview Summary, PTO-413

☐ Notice of Draftsperson's Patent Drawing Review, PTO-948

☐ Notice of Informal Patent Application, PTO-152

-- SEE OFFICE ACTION ON THE FOLLOWING PAGES --

1. Claims 1-4 and 7-18 are presented for examination and claims 5-6 and 19-10 have been cancelled.

2. The following is a quotation of 35 USC § 103 which forms the basis for all obviousness rejections set forth in this Office action:

A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Subject matter developed by another person, which qualifies as prior art only under subsection (f) or (g) of section 102 of this title, shall not preclude patentability under this section where the subject matter and the claimed invention were, at the time the invention was made, owned by the same person or subject to an obligation of assignment to the same person.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. § 103, the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 C.F.R. § 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of potential 35 U.S.C. § 102(f) or (g) prior art under 35 U.S.C. § 103.

3. Claims 3-4, 7-9, 16 and 18 objected to as being dependent upon a rejected base claims 1 and 10, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

4. Claims 1-2 and 10-15 and 17 are rejected under 35 USC § 103 as being unpatentable over Jongen et al., EPO publication number (145,063).

5. As to claims 1 and 10, Jongen et al. disclosed the invention substantially as claimed, including a data processing system comprising:

a. a source of a data stream [program signals] including data representing a distributed computing application [fig. 1]; the distributed computing application is repetitively transmitted independent of receiving client computer apparatus (see fig. 1 and page 1 lines 1-17); and

b. a client computer [eg. 1a, 1b, 1c], receiving data stream [program signals], extracting [divided into pages] the distributed computing application representative data form data stream, and executing the extracted distributed computing application (see page 1 lines 1-17 and fig. 1).

6. As to claims 10-11, Jongen et al. disclosed the invention substantially as claimed, including a data processing system comprising: an input terminal [17a-n], a processing unit [16], a system bus [5], a read/write memory [memories of processor 16] (see page 6 line 33-34), a data stream input/output adapter [8] and a processor [16] (see fig.1 and page 1 and 4-5).

7. As to claims 1 and 10, Jongen did not explicitly taught that the client computer extracts the auxiliary data from the data stream and supplies it to the auxiliary data processor. However, Jongen et al taught that the program data is divided into pages and a page number code (see page 1 lines 11-12). It would have been obvious for one of ordinary skill in the data processing art at the time the invention was made that the program signals are the data streams because it contains the picture data.

8. As to claims 2 and 12-13, Jongen et al taught an auxiliary data processor [17] and wherein the data stream source produces the data stream and auxiliary data (see fig. 1).

9. As to claim 12, Jongen et al taught that input terminal [8] receives data streams [program signals] as a series of packets containing packet carrying the distributed computing application represent data (see fig. 1 and page 1 lines 10-17). The data streams receiver comprises an auxiliary data packet extractor [16] for extracting the packets (see fig. 1).

10. As to claim 14, Jongen et al. taught an interactive television system [cable television network] and the data is an audio, video and graphic data (see fig. 1 and the abstract).

11. As to claims 15 and 17, Jongen et al taught an input

terminal [input to 8] and the data stream receiver comprises a data stream selector [8] and a distributed computing representative data extractor. The processing unit [16] for executing the extracted code (see fig. 1 and page 1 lines 5-17).

12. Applicant's arguments with respect to claims 1-4 and 7-18 have been considered but are deemed to be moot in view of the new grounds of rejection.

13. Applicant's amendment necessitated the new grounds of rejection. Accordingly, **THIS ACTION IS MADE FINAL.** See M.P.E.P. § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 C.F.R. § 1.136(a).

A SHORTENED STATUTORY PERIOD FOR RESPONSE TO THIS FINAL ACTION IS SET TO EXPIRE THREE MONTHS FROM THE DATE OF THIS ACTION. IN THE EVENT A FIRST RESPONSE IS FILED WITHIN TWO MONTHS OF THE MAILING DATE OF THIS FINAL ACTION AND THE ADVISORY ACTION IS NOT MAILED UNTIL AFTER THE END OF THE THREE-MONTH SHORTENED STATUTORY PERIOD, THEN THE SHORTENED STATUTORY PERIOD WILL EXPIRE ON THE DATE THE ADVISORY ACTION IS MAILED, AND ANY EXTENSION FEE PURSUANT TO 37 C.F.R. § 1.136(a) WILL BE CALCULATED FROM THE MAILING DATE OF THE ADVISORY ACTION. IN NO EVENT WILL THE STATUTORY PERIOD FOR RESPONSE EXPIRE LATER THAN SIX MONTHS FROM THE DATE OF THIS FINAL ACTION.

14. Any inquiry concerning this communication or earlier communications from the Examiner should be directed to Dzung Nguyen whose telephone number is (703) 305-9695.

Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 305-9600.

ALYSSA H. BOWLER
SUPERVISORY PATENT EXAMINER
GROUP 2300

D. Nguyen
Dec. 6, 1996

Evidence Appendix 2.d.

Papers from the prosecution history of U.S. patent no. 5, 819,034: Response to the December 23, 1996 FINAL Office Action (Amendment B)

Initial Review
BOX AF

RESPONSE UNDER 37 CFR 1.116
EXPEDITED PROCEDURE
EXAMINING GROUP 2300
PATENT
RCA 87,492

Ser. No. 08/233,908

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant : Kuriacose Joseph et al.

Serial No. : 08/233,908

Filed : April 28, 1994

For : APPARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS FOR A MULTIMEDIA SYSTEM (AS AMENDED)

Do not enter
DN
2/25/97

Examiner : D. Nguyen

Art Unit : 2302

RESPONSE AFTER FINAL, PURSUANT TO 37 CFR 1.116

Hon. Assistant Commissioner for Patents
Washington, D.C. 20231

Sir:

In response to the Office Action dated 12/23/96, which is directed to the above identified application, please amend such application as follows.

IN THE CLAIMS:

3. (TWICE AMENDED) [The computer system of claim 2, wherein the data stream source produces the data stream in the form of a]

A distributed computer system comprising:

a source of a data stream providing a series of time division multiplexed packets, ones of which contain [said] auxiliary data [and] that represent a television program, and others of which represent a distributed computing application associated with said television program, and wherein said distributed computing application is repeatedly transmitted during the time that said television program is transmitted; [and wherein]

a client computer, which includes a packet selector for selecting and directing packets containing said auxiliary data representing a

television program to a television signal processor and selecting and directing packets containing said associated distributed computing application to a further processor; and

said further processor including means to assemble said distributed computing application and execute said distributed computing application to form an interactive television program.

4. (TWICE AMENDED) [The computer system of claim 1, wherein:]

A distributed computer system comprising:

[the] a data stream source simultaneously produce[s]ing a plurality of continuous data streams, each repetitively including data representing a respective distributed computing application, each distributed computing application is repetitively transmitted independent of receiving client computer apparatus, and each of said distributed computing applications being in a form of a series of packets;

a first one of [the series of] packets of a respective series contain[s]ing data representing [the] an executable code module and includes identification information indicating that the first one of [the series of] packets of said series contains data representing [the] said executable code module;

a second one of packets of the series [of packets] contains data representing [the] a data module and includes identification information indicating that [the] said second one of [the series of] packets contains data representing the data module; and

a third one of [the series of] packets of the series contains auxiliary data and includes identification information indicating that the third one of [the series of] packets contains auxiliary data; [and]

[the] a client computer [further] include[s]ing a data receiver for selectively receiving one of the plurality of data streams, and extracting the corresponding distributed computing application representative data included in the selected one of the data streams and appl[ies]ying it to computer program controlled apparatus, [and the] said client computer extract[s]ing the auxiliary data from the data stream and suppl[ies]ing it to an auxiliary data processor.

7. (TWICE AMENDED) [The computer system of claim 1, wherein:]

A distributed computer system comprising:

[the] a data stream source produc[es]ing a data stream including a series of packets representing a plurality of time division multiplexed signals, one of said signals including data representing a distributed computing application, which distributed computing application is repetitively transmitted independent of receiving client computer apparatus, and at least one of the packets of the signal including the distributed computing application includ[ing]es a directory module containing information inter-relating packets associated with said distributed computing application; [and]

a client computer, receiving the data stream, extracting the distributed computing application representative data from the data stream, and executing the extracted distributed computing application; and wherein

the client computer first extracts the directory module from the data stream and using data contained in the directory module extracts [said] packets associated with said distributed computing application and builds said distributed computing application and executes said distributed computing application.

8. (TWICE AMENDED) [The computer system of claim 1, wherein:

A distributed computer system comprising:

a client computer, receiving a data stream, extracting distributed computing application representative data from said data stream, and executing the extracted distributed computing application;

[the] a data stream source [produces] providing said data representing a distributed computing application, which distributed computing application is repetitively transmitted independent of said client computer; and wherein the data stream is in the form of a series of packets;

a first one of the series of packets contains data representing [the] an executable code module and includes identification information indicating that the first one of the series of packets contains data representing [the] an executable code module;

a second one of the series of packets contains data representing [the] a data module and includes identification information indicating that the second one of the series of packets contains data representing [the] a data module;

a third one of the series of packets contains data representing a directory module inter-relating respective transmitted modules associated with a single distributed computing application, and includes identification information indicating that the third one of the series of packets contains data representing [the] a directory module; and

a fourth one of the series of packets contains auxiliary data and includes identification information indicating that the fourth one of the series of packets contains auxiliary data.

16. (TWICE AMENDED) [The client computer of claim 10, wherein said data stream includes packets of said distributed computing application multiplexed with packets of video signal, and said data selector comprises:]

In a distributed computer system, a client computer, comprising:

an input terminal for receiving a packet data stream including packets of video signal time multiplexed with packets of data representing a distributed computing application which distributed computing application is repetitively transmitted independently of said client computer and at least one of the packets representing the distributed computing application includes a directory containing information inter-relating ones of the packets containing said distributed computing application;

a data stream receiver [means] for providing separate data streams of said video signal and said distributed computing application; and

[the] a processing unit compris[es]ing:

a system bus;

read/write memory, coupled to the system bus;

a data stream input/output adapter, coupled between the data stream receiver and the system bus, for receiving the extracted distributed computing

application representative data from the data stream receiver, and storing it in the read/write memory, and having a control output terminal coupled to the selection control input terminal of the data stream selector, for producing the selection control signal; and

a processor, coupled to the system bus, for controlling the data stream input/output device to generate a selection control signal selecting a specified one of the plurality of data streams, and for assembling and executing the distributed computing application stored in the read/write memory.

Cancel claim 18

REMARKS

Claims 1-4, 7-17 remain active in this application.

Claims 3-4, 7-9, and 16 were objected to for depending from rejected base claims. Claims 3, 4, 7, 8 and 16 were placed in independent form including the limitations of their respective base claims thereby placing claims 3-4, 7-9 and 16 in condition for allowance and such is requested.

Claims 1-2, 10-15 and 17 were rejected under 35 USC 103 as being unpatentable over Jongen, which rejection is respectfully traversed.

As to claims 1 and 10 the examiner states that "Jongen et al. disclosed the invention substantially as claimed.....

a. a source of a data stream [program signals] including a distributed computing application..."

The examiner apparently has failed to appreciate the definitions of the words in the claim. A *distributed computing application* is a computer program which is executable and for example may be designed to manipulate data, or to control apparatus etc. More specifically, it is the stuff used to condition the operation of a programmable apparatus (computer or microprocessor) in a compliant receiver. Alternatively, the Jongen et al. reference discusses transmitting TELETEXT **data** in a cable television system. See page 1 line 35 to page 2 line 4 and page 2 lines 13-30. Teletext data is not a *distributed computing application* but is simply data of

the type which may be manipulated by programmed apparatus in a compliant receiver and is not the stuff used to actually program the apparatus. It is true that the claimed distributed computing application may include simple data, but teletext data may not be considered to be an executable application.

The Jongen et al. reference does not in any way suggest, for example, transmitting the program necessary to display the teletext data along with the teletext data. Receivers equipped to process teletext data in 1983 (the priority date of the reference) all had the program to manipulate the teletext data resident in the receiver at manufacture, and to the best of the undersigned's knowledge, these programs were resident in ROM and not in programmable form.

Further, claim 1 recites in part

> a client computer, receiving the data stream, extracting the distributed computing application representative data from the data stream, and executing the extracted distributed computing application.

Since the reference neither discusses or suggests transmitting a *distributed computing application* it does not show or suggest a *client computer* for extracting the *distributed computing application* or for *executing the extracted distributed computing application.*

Absent a showing or suggestion of any of these claimed features, the Jongen reference cannot render the present claim 1 unpatentable. Therefore, in view of the foregoing discussion, reconsideration and withdrawal of the 35 USC 103 rejection to claim 1 is respectfully requested.

Claim 10 includes similar recitations as claim 1 and is patentable over Jongen et al. for the same reasons as claim 1 and therefore reconsideration and withdrawal of the 35 USC 103 rejection to claim 10 is respectfully requested.

Claims 12 - 13, 15 and 17 are patentable for at least the same reasons as claim 10 from which they depend.

Claim 2 recites in part

> the data stream source produces the data stream further including auxiliary data; and

the client computer, responsive to said distributed computing application, extracts the auxiliary data from the data stream and supplies it to the auxiliary data processor.

It should be clear from the specification (page 10 lines 1-25) that *auxiliary data* is signal other than the distributed computer application, and in the example at page 10 is a TV signal. Claim 2 states that *the client computer, responsive to said distributed computing application, ... supplies it to the auxiliary data processor.*

There is no corresponding function or apparatus in the Jongen reference. That is, there is no apparatus responsive to a transmitted distributed computer application to extract and apply an auxiliary signal to auxiliary apparatus. The Jongen reference does discuss manipulation of teletext or teletext like pages by an operator responsive to page signals (simple data), but it does not discuss the extraction of non teletext data (i.e. auxiliary signal) responsive to the teletext data, and the application of non teletext data (i.e. auxiliary signal) to auxiliary apparatus.

Absent a showing or suggestion of any of these claimed features, the Jongen reference cannot render the present claim 2 unpatentable. Therefore, in view of the foregoing discussion, reconsideration and withdrawal of the 35 USC 103 rejection to claim 2 is respectfully requested.

Claim 14 recites in part

...the distributed computing system is an interactive television system, and the auxiliary data is television video and audio, and said processing unit, responsive to said distributed computing application produces and combines graphics with said television video.

First, the Jongen et al. reference does not show or discuss an *interactive television system,* of the form intended by the claim language, i.e. one in which a user through programming interacts with the audio/video information. Rather the Jongen reference only discusses displaying either video or Teletext or Teletext-like signal. The Teletext or Teletext-like signal is selectable by the user but that is distinct from the interaction between the *distributed computing*

application and the audio/video program as described in the application.

Further the Jongen et al. apparatus does not **create** graphics responsive to a transmitted *distributed computing application* but rather is **preprogrammed** at manufacture to simply display teletext data sent as pages of information to be displayed as pages of text.

Finally, teletext systems do not, in general *produces and combines graphics with said television video,* but rather substitute Teletext signal for video signal.

Absent a showing or suggestion of any of the foregoing claimed features, the Jongen reference cannot render the present claim 14 unpatentable. Therefore, in view of the foregoing discussion, reconsideration and withdrawal of the 35 USC 103 rejection to claim 14 is respectfully requested.

A fee of $400.00 is incurred by virtue of the additional five independent claims (3, 4, 7, 8, 16) in excess of three. Please charge this fee against deposit account 07-0832.

Respectfully Submitted,
KURIACOSE JOSEPH ET AL.

BY: Eric P. Herrmann
Eric P. Herrmann, Attorney
Registration No. 29,169
(609) 734-9754

GE and RCA Licensing Management Operation, Inc.
Patent Operations
CN 5312
Princeton, New Jersey 08543-0028

February 3, 1997

Certificate of Mailing under 37 CFR 1.8

I hereby certify that this correspondence is being deposited with the United States Postal Service as first class mail in a postage paid envelope addressed to: Assistant Commissioner for Patents, Washington, D.C. 20231 on the date indicated below.

Date: 7 FEB. 1997 **Signature** Eric P. Herrmann

Evidence Appendix 2.e.

Papers from the prosecution history of U.S. patent no. 5,819,034: Advisory Action mailed February 28, 1997

08/233,908

UNITED STATES DEPARTMENT OF COMMERCE
Patent and Trademark Office
Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D C 20231

SERIAL NUMBER	FILING DATE	FIRST NAMED APPLICANT	ATTORNEY DOCKET NO.
08/233,908	04/26/94	JOSEPH	

E0M1/0228

JOSEPH S TRIPOLI
PATENT OPERATIONS - GE AND RCA
LICENSING MANAGEMENT OPERATION INC
CN 5312
PRINCETON NJ 08543-0028

EXAMINER	
NGUYEN,D	
ART UNIT	PAPER NUMBER
2302	10

02/28/97

DATE MAILED:

Below is a communication from the EXAMINER in charge of this application

COMMISSIONER OF PATENTS AND TRADEMARKS

ADVISORY ACTION

☑ THE PERIOD FOR RESPONSE:

a) ☑ is extended to run ______ or continues to run 3 months from the date of the final rejection

b) ☐ expires three months from tha date of the final rejection or as of the mailing date of this Advisory Action, whichever is later. In no event however, will the statutory period for the response expire later than six months from the date of the final rejection.

Any extension of time must be obtained by filing a petition under 37 CFR 1.136(a), the proposed response and the appropriate fee. The date on which the response, the petition , and the fee have been filed is the date of the rasponse and also the date for the purposes of determining the period of extension and the corresponding amount of the fee. Any extension fee pursuant to 37 CFR 1.17 will be calculated from the date of the originally set shortened statutory period for response or as set forth in b) above.

☐ Appellant's Brief is due in accordance with 37 CFR 1.192(a).

☑ Applicant's response to the final rejection, filed 2/3/97 has been considered with the following effect, but it is not deemed to place the application in condition for allowance:

1. ☑ The proposed amendments to the claim and /or specification will not be entered and the final rejection stands because:

a. ☑ There is no convincing showing under 37 CFR 1.116(b) why the proposed amendment is necessary and was not earlier presented.

b. ☑ They raise new issues that would require further consideration and/or search. (See Note).

c. ☐ They raise the issue of new matter. (See Note).

d. ☑ They are not deemed to place the application in better form for appeal by materially reducing or simplifying the issues for appeal.

e. ☐ They prasent additional claims without cancelling a corresponding number of finally rejected claims.

NOTE: The applicant failed to rewrite claims 3-4, 16 and 18 in independent form including all limitations of base claims and intervening claims. The limitations " distributed computing application is operatively ... (claims 3-4), and " a data stream receiver, coupled ..." (claim 10).

2. ☑ Newly proposed or amended claims 7-9 would be allowed if submitted in a separately filed amendment cancelling the non-allowabla claims.

3. ☐ Upon the filing an appeal, the proposed amendment ☐ will be entarad ☑ will not ba entered and the status of the claims will be as follows:

Claims allowed: None
Claims objected to: 3-4, 7-9, and 16-18
Claims rejected: 1-2, 10-15, and 17

However;

☐ Applicant's response has overcome the following rejection(s): ______

4. ☑ The affidavit, exhibit or request for reconsideration has been considered but does not overcome tha rejection becausa the prior art still renders the claims unpatentable and the final rejection is deemed to be proper with respect to applicant's amendment filed 9/3/96.

5. ☐ The affidavit or exhibit will not be considared becausa applicant has not shown good and sufficent reasons why it was not earlier presented.

☐ The proposed drawing correction ☐ has ☐ has not been approved by the examiner.

☐ Other

ALYSSA H. BOWLER
SUPERVISORY PATENT EXAMINER
GROUP 2300

Evidence Appendix 2.f.

Papers from the prosecution history of U.S. patent no. 5,819,034: Response to the Advisory Action mailed February 28, 1997 (Amendment C)

Ser. No. 08/233,908

PATENT
RCA 87,492

11/C
ne

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant : Kuriacose Joseph et al.

Serial No. : 08/233,908

Filed : April 28, 1994

For : APPARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS FOR A MULTIMEDIA SYSTEM

Examiner : D. Nguyen

Art Unit : 2302

RESPONSE AFTER FINAL, PURSUANT TO 37 CFR 1.116

Hon. Assistant Commissioner for Patents
Washington, D.C. 20231

Sir:

In response to the Advisory Action dated 2/28/97, which is directed to the above-identified application, and which refused entry of an amendment after final dated 2/7/97, please amend such application as follows.

IN THE CLAIMS:

CANCEL CLAIMS 1, 2, 9-15, 17 AND 18 WITHOUT PREJUDICE;

3. (TWICE AMENDED) [The computer system of claim 2, wherein the data stream source produces the data stream in the form of a]
A distributed computer system comprising:
a source of a data stream providing a series of time division multiplexed packets, ones of which contain [said] auxiliary data [and] that represent a television program, and others of which represent a distributed computing application associated with said television program, and wherein said distributed computing application is [repeatedly transmitted] repetitively transmitted independent of

receiving client computer apparatus during the time that said television program is transmitted; [and wherein]

a client computer, which includes a packet selector connected to said source for selecting and directing packets containing said auxiliary data representing a television program to a television signal processor and selecting and directing packets containing said associated distributed computing application to a further processor; and

said further processor including means to assemble said distributed computing application and execute said distributed computing application to form an interactive television program.

4. (TWICE AMENDED) [The computer system of claim 1, wherein:]

A distributed computer system comprising:

[the] a data stream source simultaneously produc[es]ing a plurality of continuous data streams, each repetitively including data representing a respective distributed computing application, each distributed computing application being repetitively transmitted independent of receiving client computer apparatus, and each of said distributed computing applications being in a form of a series of packets;

a first one of [the series of] packets of a respective series contain[s]ing data representing [the] an executable code module and includ[es]ing identification information indicating that the first one of [the series of] packets of said series contains data representing [the] said executable code module;

a second one of packets of the series [of packets] contains data representing [the] a data module and includes identification information indicating that [the] said second one of [the series of] packets contains data representing the data module; and

a third one of [the series of] packets of the series contains auxiliary data and includes identification information indicating that the third one of [the series of] packets contains auxiliary data; [and]

[the] a client computer [further] includ[es]ing a data receiver for selectively receiving one of the plurality of data streams, and extracting the corresponding distributed computing application representative data included in the selected one of the data streams

and appl[ies]ying it to computer program controlled apparatus for executing the extracted distributed computing application, [and the] said data receiver [client computer] extract[s]ing the auxiliary data from the data stream and suppl[ies]ing it to an auxiliary data processor.

7. (TWICE AMENDED) [The computer system of claim 1, wherein:]

A distributed computer system comprising:

[the] a data stream source produc[es]ing a data stream including a series of packets representing a plurality of time division multiplexed signals, one of said signals including data representing a distributed computing application, which distributed computing application is repetitively transmitted independent of receiving client computer apparatus, and at least one of the packets of the signal representing the distributed computing application includ[ing]es a directory module containing information inter-relating packets associated with said distributed computing application; [and]

a client computer, receiving the data stream, extracting the distributed computing application representative data from the data stream, and executing the extracted distributed computing application; and wherein

the client computer [first] extracts [the] said directory module from the data stream and using data contained in the directory module extracts [said] packets associated with said distributed computing application and builds said distributed computing application and executes said distributed computing application.

8. (TWICE AMENDED) The computer system of claim [1] 7, wherein:

[the data stream source produces the data stream in the form of a series of packets;]

a first one of the series of packets contains data representing [the] an executable code module and includes identification information indicating that the first one of the series of packets contains data representing [the] an executable code module;

a second one of the series of packets contains data representing [the] a data module and includes identification information indicating

that the second one of the series of packets contains data representing [the] a data module;

a third one of the series of packets contains data representing [a] said directory module inter-relating respective transmitted modules associated with a single distributed computing application, and includes identification information indicating that the third one of the series of packets contains data representing [the] said directory module; and

a fourth one of the series of packets contains auxiliary data and includes identification information indicating that the fourth one of the series of packets contains auxiliary data.

16. (TWICE AMENDED) [The client computer of claim 10, wherein said data stream includes packets of said distributed computing application multiplexed with packets of video signal, and said data selector comprises:]

In a distributed computer system, a client computer, comprising:

an input terminal for receiving a packet data stream including packets of video signal time multiplexed with packets of data representing a distributed computing application which distributed computing application is repetitively transmitted independently of said client computer and at least one of the packets representing the distributed computing application includes a directory containing information inter-relating ones of the packets containing said distributed computing application;

[means] a data stream receiver, coupled to said input terminal, for receiving the data stream, [for] providing separate data streams of said video signal and said distributed computing application, extracting said directory packet and responsive to the directory, extracting packets containing said distributed computing application representative data; and

[the] a processing unit, coupled to the data stream receiver, for assembling said distributed computing application and executing the distributed computing application compris[es]ing:

a system bus;

read/write memory, coupled to the system bus;

a data stream input/output adapter, coupled between the data stream receiver and the system bus, for receiving the extracted distributed computing application representative data from the data stream receiver, and storing it in the read/write memory, and having a control output terminal coupled to the selection control input terminal of the data stream selector, for producing the selection control signal; and

a processor, coupled to the system bus, for controlling the data stream input/output device to generate a selection control signal selecting a specified one of the plurality of data streams, and for assembling and executing the distributed computing application stored in the read/write memory.

REMARKS

Claims 3-4, 7-8 and 16 remain active in this application.

Claims 3-4, 7-8 and 16 were objected to for depending from rejected base claims. Claims 3, 4, 7, and 16 were placed in independent form including the limitations of their respective base claims thereby placing claims 3-4, 7-8 and 16 in condition for allowance and such is requested.

This is applicant's second attempt at placing claims 3-4, 7 and 16 in independent form, including all limitations of the base claims, but without rendering the claim language unduly stilted. If the examiner is not satisfied with the particular wording he is requested to telephone the undersigned attorney to workout acceptable claim language.

Ser. No. 08/233,908

PATENT
RCA 87,492

A fee of $80.00 is incurred by virtue of one additional independent claims (16) in excess of three independent claims. Please charge this fee against deposit account 07-0832. Charge any appropriate additional fees or credit any overages to deposit account 07-0832.

Respectfully Submitted,
KURIACOSE JOSEPH ET AL.

BY: Eric P. Herrmann

Eric P. Herrmann, Attorney
Registration No. 29,169
(609) 734-9754

GE and RCA Licensing Management Operation, Inc.
Patent Operations
CN 5312
Princeton, New Jersey 08543-0028

March 18, 1997

Certificate Of Transmission

I hereby certify that this correspondence is being facsimile transmitted to the Patent and Trademark Office:(fax No.)

Date 18 MAR, 1997 Eric P. Herrmann

ERIC P. HERRMANN

Evidence Appendix 2.g.

Papers from the prosecution history of U.S. patent no. 5,819,034: Office Action mailed April 11, 1997

08/233,908

UNITED STATES DEPARTMENT OF COMMERCE
Patent and Trademark Office

Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D.C. 20231

SERIAL NUMBER	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.
08/233,908	04/28/94	JOSEPH	K

B3M1/0411

JOSEPH S TRIPOLI
PATENT OPERATIONS - GE AND RCA
LICENSING MANAGEMENT OPERATION INC
CN 5312
PRINCETON NJ 08543-0028

EXAMINER	
NGUYEN, D	
ART UNIT	**PAPER NUMBER**
2302	13
DATE MAILED:	04/11/97

This is a communication from the examiner in charge of your application
COMMISSIONER OF PATENTS AND TRADEMARKS

☑ This application has been examined ☑ Responsive to communication filed on 3/18/96 ☐ This action is made final.

A shortened statutory period for response to this action is set to expire 3 month(s), _____ days from the date of this letter.
Failure to respond within the period for response will cause the application to become abandoned. 35 U.S.C. 133

Part I THE FOLLOWING ATTACHMENT(S) ARE PART OF THIS ACTION:

1. ☑ Notice of References Cited by Examiner, PTO-892.
2. ☐ Notice re Patent Drawing, PTO-948.
3. ☑ Notice of Art Cited by Applicant, PTO-1449.
4. ☐ Notice of Informal Patent Application, Form PTO-152.
5. ☐ Information on How to Effect Drawing Changes, PTO-1474.
6. ☐ _____

Part II SUMMARY OF ACTION

1. ☑ Claims 3-4, 7-8, and 16 are pending in the application.
   Of the above, claims _____ are withdrawn from consideration.
2. ☑ Claims 1-2, 5-6, 9-15 and 17-20 have been cancelled.
3. ☑ Claims 16 are allowed.
4. ☐ Claims _____ are rejected.
5. ☐ Claims _____ are objected to.
6. ☐ Claims _____ are subject to restriction or election requirement.
7. ☑ This application has been filed with informal drawings under 37 C.F.R. 1.85 which are acceptable for examination purposes.
8. ☐ Formal drawings are required in response to this Office action.
9. ☐ The corrected or substitute drawings have been received on _____. Under 37 C.F.R. 1.84 these drawings are ☐ acceptable. ☐ not acceptable (see explanation or Notice re Patent Drawing, PTO-948).
10. ☐ The proposed additional or substitute sheet(s) of drawings, filed on _____ has (have) been ☐ approved by the examiner. ☐ disapproved by the examiner (see explanation).
11. ☐ The proposed drawing correction, filed on _____, has been ☐ approved. ☐ disapproved (see explanation).
12. ☐ Acknowledgment is made of the claim for priority under U.S.C. 119. The certified copy has ☐ been received ☐ not been received
    ☐ been filed in parent application, serial no. _____; filed on _____
13. ☐ Since this application appears to be in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11; 453 O.G. 213.
14. ☑ Other See attached

EXAMINER'S ACTION

PTOL-326 (Rev. 9-89)

1. The finality of the last Office action is withdrawn.

2. Claims 3-4,7-8 and 16 are presented for examination and claims 1-2, 5-6, 9-15 and 17-20 have been cancelled.7

3. Claim 3 is rejected under 35 USC § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

I. The following terms lack proper antecedent basis:

"the time" (line 11) and "a television program" (lines 15) should read "said or the television program" (claim 1).

4. Claim 16 is allowable over the prior art of record.

5. The following is a quotation of 35 USC § 103 which forms the basis for all obviousness rejections set forth in this Office action:

A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Subject matter developed by another person, which qualifies as prior art only under subsection (f) or (g) of section 102 of this title, shall not preclude patentability under this section where the subject matter and the claimed invention were, at the time the invention was made, owned by the same person or subject to an obligation of assignment to the same person.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. § 103, the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 C.F.R. § 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of potential 35 U.S.C. § 102(f) or (g) prior art under 35 U.S.C. § 103.

6. Claims 3-4 and 7-8 are rejected under 35 USC § 103 as being unpatentable over Lappington et al., US. patent (5,343,239) in view of Jongen et al., EPO publication number (145,063).

7. As to claims 3-4 and 7 Lappington et al. disclosed the invention substantially as claimed, including a data processing system comprising:

a. a source of a data stream [22] providing a series of time division multiplexed packets, ones of which contain auxiliary data [interactive data] representing a television program, and others of which represent a distributed computing application associated with said television program [video program] (see fig. 1);

b. a client computer [28], which is included a packet selector [50] connected to said source for selecting and directing packets containing said auxiliary data representing a television program to a television signal processor and selecting and directing packets containing said associated distributed computing application to a further processor [72] (see fig.1);

and

c. said further processor [72] including means to assemble said distributed computing application and execute said distributed computing application to form an interactive television program (see fig. 1 and abstract).

8. As to claim 4, Lappington et al taught that a packet contains a data representing an executable code module [high level command language] and including identification information PID] indicating that the packet contains the executable code (see col. 2 lines 37-57).

9. As to claim 7, Lappington taught a client computer receiving the data stream [22], extracting the distributed computing application [high level command language] representative from the data stream and executing the computing application (see the abstract)

10. As to claims 3-4 and 7, Lappington et al did not teach that the distributed computing application is repetitively transmitted independent of receiving client computer apparatus during a time that said television program is transmitted ; However, Longen taught distributed computing application is repetitively transmitted independent of receiving client computer apparatus during a time that said television program is transmitted (the

abstract).

11. As to claim 4 and 8, Lappington et al taught that the series of packets contain data module [interactive data], auxiliary data [video data]. The data receiver [50] extracts the auxiliary dada from the data stream and supplies it to an auxiliary data processor [72] (see fig. 1).

12. It would have been obvious to one of ordinary skill in the data processing art at the time the invention was made to incorporate the teaching of Jongen into the system taught by Lappington et al because the combination system would allow the system taught by Lappington et al by repetitively receiving the coded information during the time that the television program is transmitted. Thereby, the user could access any television programs at any time without waiting for the coded information available.

13. Any inquiry concerning this communication or earlier communications from the Examiner should be directed to Dzung Nguyen whose telephone number is (703) 305-9695.

Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 305-9600.

14. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

a. Menand et al, US. patent (5,548,532).

b. Harvey et al, US. patent (5,233,654).

c. Hendricks et al, US. patent (5,600,364).

ALYSSA H. BOWLER
SUPERVISORY PATENT EXAMINER
GROUP 2300

D. Nguyen

April 4, 1997

Evidence Appendix 2.h.

Papers from the prosecution history of U.S. patent no. 5, 819,034: Response to the April 11, 1997 Office Action (Amendment D)

Ser. No. 08/233,908

PATENT
RCA 87,492

#15E

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant : Kuriacose Joseph et al.

Serial No. : 08/233,908

Filed : April 28, 1994

For : APPARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS FOR A MULTIMEDIA SYSTEM

Examiner : D. Nguyen

Art Unit : 2302

Found USPTO Image 6/30/97

ok to enter 1/28/98

AMENDMENT PURSUANT TO 37 CFR 1.111

Hon. Assistant Commissioner for Patents
Washington, D.C. 20231

Sir:

In response to the Office Action dated 4/11/97, which is directed to the above-identified application, please amend such application as follows.

IN THE CLAIMS:

1. (THRICE AMENDED) A distributed computer system comprising:

a source of a data stream providing a series of time division multiplexed packets, ones of which contain auxiliary data that represent a [television] video program, and others of which represent a distributed computing application associated with said [television] video program, and wherein said distributed computing application is repetitively transmitted independent of receiving client computer apparatus during [the] times that said [television] video program is transmitted;

E1

a client computer, which includes a packet selector connected to said source for selecting and directing packets containing said auxiliary data representing [a television] said video program to a

30

[television] video signal processor and selecting and directing packets containing said associated distributed computing application to a further processor; and

said further processor including means to assemble said distributed computing application and execute said distributed computing application to form an interactive [television] video program in which execution of said distributed computing application alters said video program.

6. (THRICE AMENDED) A distributed computer system comprising:

a source of [data stream source simultaneously producing] a time division multiplexed packet signal including a plurality of [continuous data streams, each repetitively including data representing a respective] distributed computing applications, each distributed computing application being repetitively transmitted independent of receiving client computer apparatus, and each of said distributed computing applications being in a form of a series of packets;

a first one of packets of a respective series containing data representing an executable code module and including identification information indicating that the first one of packets of said series contains data representing said executable code module;

a second one of packets of the series contains data representing a data module and includes identification information indicating that said second one of packets contains data representing the data module; and

a third one of packets of the series contains auxiliary data and includes identification information indicating that the third one of packets contains auxiliary data;

a client computer including a data receiver for [selectively receiving] selecting packets of one of the plurality of [data streams] distributed computing applications, and extracting the corresponding distributed computing application representative data included in the selected packets [one of the data streams] and applying it to computer program controlled apparatus for executing the extracted distributed computing application, said data receiver extracting [the]

auxiliary data from auxiliary packets in the data stream and supplying it to an auxiliary data processor.

Please add the following claims:

21. (NEWLY ADDED) The distributed computer system of claim 1 wherein said further processor includes a graphics adapter for creating graphical images and interactively combining said graphical images with said video program.

22. (NEWLY ADDED) The distributed computer system of claim 1 wherein said video program is a television program and said further processor includes a graphics adapter for creating graphical images and interactively combining said graphical images with said television program.

23. (NEWLY ADDED) The distributed computer system of claim 1 wherein said further processor includes a sound adapter for creating synthesized sound and interactively combining said synthesized sound with said video program.

24. (NEWLY ADDED) The distributed computer system of claim 1 wherein said further processor includes memory for storing program controls and responsive thereto requests of said packet selector a code and/or data module from the data stream.

REMARKS

Claims 3-4, 7-8, 16 and 21-24 remain active in this application. Claim 16 is allowed.

Claim 3 was rejected under 35 USC 112 as being indefinite. Claim 3 was amended as suggested by the examiner and thus the 35 USC 112 rejection is believed to have been overcome and reconsideration is requested.

Claims 3-4 and 7-8 were rejected under 35 USC 103 as being unpatentable over Lappington et al. in view of Jongen et al., which rejection is respectfully traversed.

Claim 3 recites

> a source of a data stream providing a **series of time division multiplexed packets, ones of which contain auxiliary data that represent a video program, and others of which represent a distributed computing application** associated with said video program, and wherein said distributed computing application is repetitively transmitted independent of receiving client computer apparatus during times that said video program is transmitted;
>
> a client computer, which includes **a packet selector** connected to said source **for selecting and directing packets containing said auxiliary data representing said video program to a video signal processor and selecting and directing packets containing said associated distributed computing application to a further processor**; and
>
> said **further processor** including means to assemble said distributed computing application and execute said distributed computing application **to form an interactive video program in which execution of said distributed computing application alters said video program**.

Lappington on the other hand describes a system wherein an interactive program is inserted in the vertical blanking intervals (VBI) of a TV program. A special receiver extracts this interactive program from the VBI and transmits it as a packet signal to a hand held device. The handheld device uses the transmitted data to form a display on the handheld device and allow the user to perform operations on the handheld device in concert with a program displayed on a TV. See col. 4 line 65 to col. 7, line 35 and note Fig. 1 which shows one way transmission from the TV to the handheld device. Lappington does not show or describe a system employing an *interactive video program in which execution of said distributed computing application* ***alters said video program***. Nor does

Lappington show or suggest a system using a *source of a data stream providing a series of time division multiplexed packets,* ***ones of which contain auxiliary data that represent a video program,*** *and others of which represent* ***a distributed computing application.*** Rather the Lappington receiver generates the packets from the data in the VBI and transmits the packets over the IR link. See col. 11.

Thirdly, the Lappington device does not show or suggest *a packet selector connected to said source for* ***selecting and directing packets containing said auxiliary data*** *representing said video program* ***to a video signal processor*** *and* ***selecting and directing packets containing said associated distributed computing application to a further processor.***

Lappington element 22 does not provide time division multiplexed packets ones of which include a television program as suggested by the examiner. The interactive data transmitted by the Lappington apparatus is included within the video signal and is not transmitted as a time division multiplexed packet signal. Since the Lappington apparatus generates the packets at the receiver, it can hardly select between auxiliary and application packets.

The Jongen reference adds nothing to Lappington re. the issue of patentability of claim 3. Jongen merely discusses transmitting Teletext data in a passive system as opposed to an interactive system transmitting executable programs.

Since Lappington and Jongen neither severally or combined show or suggest the features discussed above they cannot render claim 3 unpatentable under 35 USC 103. Therefore reconsideration and withdrawal of the rejection is respectfully requested.

Claim 4 recites:

A distributed computer system comprising:

a source of **a time division multiplexed packet signal** including a plurality of distributed computing applications, each distributed computing application being repetitively transmitted independent of receiving client computer apparatus, and each of said distributed computing applications being in a **form of a series** of packets;

a **first** one of **packets** of a respective series

containing data representing an executable code module and including identification information indicating that the first one of packets of said series contains data representing said executable code module;

a second one of **packets** of the series **contains data representing a data module** and includes identification information indicating that said second one of packets contains data representing the data module; and

a **third** one of **packets** of the series **contains auxiliary data** and includes identification information indicating that the third one of packets contains auxiliary data;

a client computer including **a data receiver for selecting packets of one of the plurality of distributed computing applications,** and extracting the corresponding distributed computing application representative data included in the selected packets and **applying it to computer program controlled apparatus for executing the extracted distributed computing application, said data receiver extracting auxiliary data from auxiliary packets in the data stream and supplying it to an auxiliary data processor.**

Contrary to this packet structure, in the Lappington apparatus "The interactive programs and messages are transmitted over the IR link in a data format **structured as a packet containing all** of the interactive commands required for a participant to use the handheld device 28." See col. 11, lines 32-36 and lines 39-45 for the packet structure. Nothing is said about executable code modules, data modules, auxiliary data, etc.

Applicant does not concur with the examiner's assessment that Lappington et al. teaches a packet with an executable code module [high level command language]. Rather it would appear that any executable code is resident, in part, in the handheld device. A group of commands specific to a TV program is transmitted and loaded into memory in the handheld device, which commands are arranged to cooperate with the resident program. Finally small transactional programs are transmitted which use the commands. As such the group of commands that are transmitted and loaded in the memory of the handheld device can hardly be equated with the executable code modules in claim 4. Further, there certainly is no distinction in

Lappington between program and auxiliary packets, thus there can be no selection between program and auxiliary packets.

Since it is obvious that the Lappington reference does not suggest the claim 4 packet structure, it cannot render the claim 4 unpatentable under 35 USC 103. Therefore reconsideration and withdrawal of the rejection is respectfully requested.

Claim 8 is similar to claim 4 and the foregoing argument applies equally with respect to claim 8. In addition claim 8 recites a directory module which interrelates the other modules. No mention or suggestion is made in either Lappington or Jongen about directory modules interrelating other modules in an interactive TV system. Therefore reconsideration and withdrawal of the rejection is respectfully requested.

Claim 7 recites a directory module and

the client computer extracts said directory module from the data stream and using data contained in the directory module extracts packets associated with said distributed computing application and builds said distributed computing application and executes said distributed computing application.

As shown with respect to claims 4 and 8, the Lappington reference does not show or suggest the concept of a directory module in a distributed computing application, and thus it cannot suggest that *the client computer extracts said directory module from the data stream and using data contained in the directory module extracts packets associated with said distributed computing application* etc.

Absent any such suggestion, the Lappington reference cannot render the claim 7 unpatentable under 35 USC 103. Therefore reconsideration and withdrawal of the rejection is respectfully requested.

New claims 21-23 all recite interactive apparatus wherein the processor responsive to the transmitted interactivc program all interact with a video program to alter the packet video program. Support for claims 21-23 is found at page 23 of the specification. Neither the Lappington nor the Jongen show or discuss an interactive program which can alter an other packet video program. Therefore

claims 21-23 are patentable over the references Lappington and Jongen.

Claim 24 is patentable for the same reasons set forth with respect to claim 7. Support for claim 24 is found on page 22 of the specification (last paragraph).

No fee is believed to have been incurred by virtue of this amendment. If an appropriate fee has been incurred, please charge such fee to deposit account 07-0832.

Respectfully Submitted,
KURIACOSE JOSEPH ET AL.

BY: Eric P. Herrmann

Eric P. Herrmann, Attorney
Registration No. 29,169
(609) 734-9754

GE and RCA Licensing Management Operation, Inc.
Patent Operations
P. O. Box 5312
Princeton, New Jersey 08543-5312

June 30, 1997

Certificate Of Transmission

I hereby certify that this correspondence is being facsimile transmitted to the Patent and Trademark Office: (fax No. 703-308-5359)

Date June 30, 1997 Eric P. Herrmann

ERIC P. HERRMANN

Evidence Appendix 2.i.

Papers from the prosecution history of U.S. patent no. 5,819,034: Notice of Allowance mailed May, 11, 1998

08/233,908

UNITED STATES DEPARTMENT OF COMMERCE
Patent and Trademark Office
Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D.C. 20231

SERIAL NUMBER	FILING DATE	FIRST NAMED APPLICANT	ATTORNEY DOCKET NO.
08/233,908	04/28/94	JOSEPH	K

LM21/0511

JOSEPH S TRIPOLI
PATENT OPERATIONS - GE AND RCA
LICENSING MANAGEMENT OPERATION INC
CN 5312
PRINCETON NJ 08543-0028

EXAMINER	
NGUYEN, D	
ART UNIT	**PAPER NUMBER**
2783	19

DATE MAILED: 05/11/98

NOTICE OF ALLOWABILITY

PART I.

1. [X] This communication is responsive to applicant's terminal disclaimer filed 2/9/98.
2. [X] All the claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice Of Allowance And Issue Fee Due or other appropriate communication will be sent in due course
3. [X] The allowed claims are 3,4,7,8,16 and 21-24 (now claims 1-9).
4. [ ] The drawings filed on _____ are acceptable.
5. [ ] Acknowledgment is made of the claim for-priority under 35 U.S.C. 119. The certified copy has [ ] been received. [ ] not been received. [ ] been filed in parent application Serial No. _____, filed on _____
6. [ ] Note the attached Examiner's Amendment
7. [ ] Note the attached Examiner Interview Summary Record, PTOL-413.
8. [ ] Note the attached Examiner's Statement of Reasons for Allowance.
9. [ ] Note the attached NOTICE OF REFERENCES CITED, PTO-892.
10. [ ] Note the attached INFORMATION DISCLOSURE CITATION, PTO-1449.

PART II.

A SHORTENED STATUTORY PERIOD FOR RESPONSE to comply with the requirements noted below is set to EXPIRE THREE MONTHS FROM THE "DATE MAILED" indicated on this form. Failure to timely comply will result in the ABANDONMENT of this application. Extensions of time may be obtained under the provisions of 37 CFR 1.136(a).

1. [ ] Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL APPLICATION, PTO-152, which discloses that the oath or declaration is deficient. A SUBSTITUTE OATH OR DECLARATION IS REQUIRED.
2. [X] APPLICANT MUST MAKE THE DRAWING CHANGES INDICATED BELOW IN THE MANNER SET FORTH ON THE REVERSE SIDE OF THIS PAPER.
   a. [X] Drawing informalities are indicated on the NOTICE RE PATENT DRAWINGS, PTO-948, attached hereto or to Paper No. 6. CORRECTION IS REQUIRED.
   b. [ ] The proposed drawing correction filed on _____ has been approved by the examiner. CORRECTION IS REQUIRED.
   c. [ ] Approved drawing corrections are described by the examiner in the attached EXAMINER'S AMENDMENT. CORRECTION IS REQUIRED.
   d. [X] Formal drawings are now REQUIRED.

Any response to this letter should include in the upper right hand corner, the following information from the NOTICE OF ALLOWANCE AND ISSUE FEE DUE: ISSUE BATCH NUMBER, DATE OF THE NOTICE OF ALLOWANCE, AND SERIAL NUMBER.

Attachments:

- _ Examiner's Amendment
- _ Examiner Interview Summary Record, PTOL-413
- _ Reasons for Allowance
- _ Notice of References Cited, PTO-892
- _ Information Disclosure Citation, PTO-1449
- _ Notice of Informal Application, PTO-152
- _ Notice re Patent Drawings, PTO-948
- _ Listing of Bonded Draftsmen
- _ Other

ALYSSA H. BOWLER
SUPERVISORY PATENT EXAMINER
GROUP 2700

PTOL-37 (REV. 4-89) *

UNITED STATES DEPARTMENT OF COMMERCE
Patent and Trademark Office

NOTICE OF ALLOWANCE AND ISSUE FEE DUE

LM21/0511

JOSEPH S TRIPOLI
PATENT OPERATIONS - GE AND RCA
LICENSING MANAGEMENT OPERATION INC
CN 5312
PRINCETON NJ 08543-0028

APPLICATION NO.	FILING DATE	TOTAL CLAIMS	EXAMINER AND GROUP ART UNIT		DATE MAILED
08/233,908	04/28/94	009	NGUYEN, D	2783	05/11/98

First Named Applicant	JOSEPH,	KURTAUSE

TITLE OF INVENTION: APPAARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS FOR A MULTIMEDIA SYSTEM (AS AMENDED)

ATTY'S DOCKET NO.	CLASS-SUBCLASS	BATCH NO.	APPLN. TYPE	SMALL ENTITY	FEE DUE	DATE DUE
	395-200.310	D93	UTILITY	NO	$1320.00	08/11/98

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. PROSECUTION ON THE MERITS IS CLOSED.

THE ISSUE FEE MUST BE PAID WITHIN THREE MONTHS FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. THIS STATUTORY PERIOD CANNOT BE EXTENDED.

HOW TO RESPOND TO THIS NOTICE:

I. Review the SMALL ENTITY status shown above.
If the SMALL ENTITY is shown as YES, verify your current SMALL ENTITY status:

A. If the status is changed, pay twice the amount of the FEE DUE shown above and notify the Patent and Trademark Office of the change in status, or
B. If the status is the same, pay the FEE DUE shown above.

If the SMALL ENTITY is shown as NO:

A. Pay FEE DUE shown above, or

B. File verified statement of Small Entity Status before, or with, payment of 1/2 the FEE DUE shown above.

II. Part B-Issue Fee Transmittal should be completed and returned to the Patent and Trademark Office (PTO) with your ISSUE FEE. Even if the ISSUE FEE has already been paid by charge to deposit account, Part B Issue Fee Transmittal should be completed and returned. If you are charging the ISSUE FEE to your deposit account, section "4b" of Part B-Issue Fee Transmittal should be completed and an extra copy of the form should be submitted.

III. All communications regarding this application must give application number and batch number. Please direct all communications prior to issuance to Box ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Utility patents issuing on applications filed on or after Dec. 12, 1980 may require payment of maintenance fees. It is patentee's responsibility to ensure timely payment of maintenance fees when due.

PART B—ISSUE FEE TRANSMITTAL

Complete and mail this form, together with applicable fees, to: Box ISSUE FEE
Assistant Commissioner for Patents
Washington, D.C. 20231

4100

MAILING INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE. Blocks 1 through 4 should be completed where appropriate. All further correspondence including the Issue Fee Receipt, the Patent, advance orders and notification of maintenance fees will be mailed to the current correspondence address as indicated unless corrected below or directed otherwise in Block 1, by (a) specifying a new correspondence address; and/or (b) indicating a separate "FEE ADDRESS" for maintenance fee notifications.

CURRENT CORRESPONDENCE ADDRESS (Note: Legibly mark-up with any corrections or use Block 1)

LM21/0511

JOSEPH S TRIPOLI
PATENT OPERATIONS - GE AND RCA
LICENSING MANAGEMENT OPERATION INC
CN 5312
PRINCETON NJ 08543-0028

Note: The certificate of mailing below can only be used for domestic mailings of the Issue Fee Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, must have its own certificate of mailing.

Certificate of Mailing

I hereby certify that this Issue Fee Transmittal is being deposited with the United States Postal Service with sufficient postage for first class mail in an envelope addressed to the Box Issue Fee address above on the date indicated below.

ERIC P. HERRMANN (Depositor's name)

Eric P. Herrmann (Signature)

7/7/1998 (Date)

RECEIVED
JUL 10 1998
Publishing Division

APPLICATION NO.	FILING DATE	TOTAL CLAIMS	EXAMINER AND GROUP ART UNIT	DATE MAILED
08/233,908	04/28/94	009	2783	05/11/98

First Named Applicant: JOSEPH, KURIACOSE

TITLE OF INVENTION: APPARATUS FOR TRANSMITTING AND RECEIVING EXECUTABLE APPLICATIONS AS OUT FOR A MULTIMEDIA SYSTEM (AS AMENDED)

ATTY'S DOCKET NO.	CLASS-SUBCLASS	BATCH NO.	APPLN. TYPE	SMALL ENTITY	FEE DUE	DATE DUE
395-200.310	D93		UTILITY	NO	$1320.00	08/11/98

1. Change of correspondence address or indication of " Fee Address" (37 CFR 1.363). Use of PTO form(s) and Customer Number are recommended, but not required.

☐ Change of correspondence address (or Change of Correspondence Address form PTO/SB/122) attached.

☐ "Fee Address" indication (or "Fee Address" Indication form PTO/SB/47) attached.

2. For printing on the patent front page, list (1) the names of up to 3 registered patent attorneys or agents OR, alternatively, (2) the name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed.

1 Joseph S. Tripoli
2 Eric P. Herrmann
3 Ronald H. Kurdyla

3. ASSIGNEE NAME AND RESIDENCE DATA TO BE PRINTED ON THE PATENT (print or type)
PLEASE NOTE: Unless an assignee is identified below, no assignee data will appear on the patent. Inclusion of assignee data is only appropriate when an assignment has been previously submitted to the PTO or is being submitted under separate cover. Completion of this form is NOT a substitute for filing an assignment.

(A) NAME OF ASSIGNEE: Thomson Consumer Electronics, Inc.

(B) RESIDENCE: (CITY & STATE OR COUNTRY) Indianapolis, Indiana

Please check the appropriate assignee category indicated below (will not be printed on the patent)

☐ individual ☒ corporation or other private group entity ☐ government

4a. The following fees are enclosed (make check payable to Commissioner of Patents and Trademarks):

☐ Issue Fee
☐ Advance Order - # of Copies

4b. The following fees or deficiency in these fees should be charged to:

DEPOSIT ACCOUNT NUMBER 07-0832
(ENCLOSE AN EXTRA COPY OF THIS FORM)

☒ Issue Fee
☒ Advance Order - # of Copies 10

The COMMISSIONER OF PATENTS AND TRADEMARKS IS requested to apply the Issue Fee to the application identified above.

(Authorized Signature) Eric P. Herrmann Reg. No. 29,169 (Date) 7/14/98

NOTE: The Issue Fee will not be accepted from anyone other than the applicant; a registered attorney or agent; or the assignee or other party in interest as shown by the records of the Patent and Trademark Office.

Burden Hour Statement: This form is estimated to take 0.2 hours to complete. Time will vary depending on the needs of the individual case. Any comments on the amount of time required to complete this form should be sent to the Chief Information Officer, Patent and Trademark Office, Washington, D.C. 20231. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND FEES AND THIS FORM TO: Box Issue Fee, Assistant Commissioner for Patents, Washington D.C. 20231

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

07/21/1998 ASEAFORT 00000074 070832 08233908
01 FC:142 1320.00 CH
02 FC:561 30.00 CH

TRANSMIT THIS FORM WITH FEE

10. RELATED PROCEEDINGS APPENDIX

Notice of Appeal was filed with respect to U.S. patent application no. 12/479,383.